

LE 'USPAT' ENTERED AT 07:50:33 ON 04 MAR 96

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* * * * *
*           W E L C O M E   T O   T H E
*           U . S .   P A T E N T   T E X T   F I L E
* * * * *
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=> e cobbold/in

```
E1      11      COBBLEDICK, DAVID S/IN
E2       2      COBBLEDICK, DAVID STANLEY/IN
E3       0  --> COBBOLD/IN
E4       1      COBBOLD, STEPHEN P/IN
E5       1      COBBS, CARRINGTON S/IN
E6       1      COBBS, DAVID/IN
E7       3      COBBS, DAVID C/IN
E8       1      COBBS, DAVID H/IN
E9      12      COBBS, JAMES H/IN
E10      6      COBBS, KEITH E/IN
E11      1      COBBS, RICHARD W/IN
E12     17      COBBS, WALTER H JR/IN
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=> s e4

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L1      1 "COBBOLD, STEPHEN P"/IN
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=> e waldmann, herman ?/in

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E1       4      WALDMANN, HERBERT/IN
E2       1      WALDMANN, HERMAN/IN
E3       0  --> WALDMANN, HERMAN ?/IN
E4      18      WALDMANN, HERMANN/IN
E5       1      WALDMANN, HERRMANN/IN
E6       1      WALDMANN, HORST/IN
E7       1      WALDMANN, JACOBO/IN
E8       8      WALDMANN, JOHN J/IN
E9       1      WALDMANN, JOHN JOSEPH/IN
E10      2      WALDMANN, JUERGEN/IN
E11      5      WALDMANN, JURGEN/IN
E12     10      WALDMANN, KARL/IN
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=> s e2

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L2      1 "WALDMANN, HERMAN"/IN
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=> d l1

1. 4,841,025, Jun. 20, 1989, Antibody preparations; \*\*Stephen P. Cobbold\*\*, et al., 530/387.3; 424/133.1, 141.1, 154.1, 155.1; 435/240.27; 530/388.1, 388.2, 388.7, 388.75, 388.8, 412, 413, 808; 935/107, 110 [IMAGE AVAILABLE]

=> d l2

1. 4,841,025, Jun. 20, 1989, Antibody preparations; Stephen P. Cobbold, et al., 530/387.3; 424/133.1, 141.1, 154.1, 155.1; 435/240.27; 530/388.1, 388.2, 388.7, 388.75, 388.8, 412, 413, 808; 935/107, 110 [IMAGE AVAILABLE]

=> s cd4(p)tolerance

845 CD4

60438 TOLERANCE

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L3      10 CD4 (P) TOLERANCE
```

=> d l3 1-10

1. 5,480,872, Jan. 2, 1996, Method of providing external nutritional support to persons infected with human immunodeficiency virus; Frederick O. Cope, et al., 514/21; 426/641, 648, 654, 656, 657 [IMAGE AVAILABLE]

2. 5,422,274, Jun. 6, 1995, Internal deletion mutants of soluble

T4(CD4); Paul J. Maddon, et al., 435/320.1; 424/188.1, 208.1; 435/69.4, 69.6, 172.3; 530/388.35; 536/23.1 [IMAGE AVAILABLE]

3. 5,403,826, Apr. 4, 1995, Nutritional product for persons infected with human immunodeficiency virus; Frederick O. Cope, et al., 514/21; 426/656, 800; 514/2, 23 [IMAGE AVAILABLE]

4. 5,397,702, Mar. 14, 1995, Assay for and treatment of autoimmune diseases; Michael D. Cahalan, et al., 435/69.1, 6, 172.3; 536/23.1, 23.5, 25.5 [IMAGE AVAILABLE]

5. 5,374,620, Dec. 20, 1994, Growth-promoting composition and its use; Ross G. Clark, et al., 514/12, 4, 21; 530/399; 930/10, 120 [IMAGE AVAILABLE]

6. 5,330,972, Jul. 19, 1994, Method of impeding apoptosis of CD4 cells in persons infected with human immunodeficiency virus; Frederick O. Cope, 514/2; 426/44, 46, 419, 656, 658, 800; 514/21; 530/378 [IMAGE AVAILABLE]

7. 5,248,499, Sep. 28, 1993, Control of microbial infections in transplant patients; Christine Czarniecki, et al., 424/85.2, 85.1, 85.5 [IMAGE AVAILABLE]

8. 5,126,433, Jun. 30, 1992, Soluble forms of the T cell surface protein CD4; Paul J. Maddon, et al., 530/395, 350, 380, 387.2, 387.9, 389.1 [IMAGE AVAILABLE]

9. 5,110,906, May 5, 1992, Derivatives of soluble T-4; Paul J. Maddon, et al., 530/350; 435/5, 974; 530/395, 821; 930/221 [IMAGE AVAILABLE]

10. 5,081,226, Jan. 14, 1992, Synthetic peptides sharing sequence homology with the HIV envelope protein; Jay A. Berzofsky, et al., 530/324; 424/188.1, 208.1; 514/2, 8, 10, 12, 13, 14, 21; 530/325, 326, 327, 350 [IMAGE AVAILABLE]

=> d l3 4,8,9 kwic

US PAT NO: 5,397,702 [IMAGE AVAILABLE]

L3: 4 of 10

DETDESC:

DETD(104)

Augmented type 1 K.sup.+ channel expression appears to be a valuable marker for \*\*CD4\*\*.sup.- CD8.sup.- cells associated with murine SLE, type-1 diabetes mellitus and chronic EAE. These results focus attention on the possible role of \*\*CD4\*\*.sup.- CD8.sup.- T cells in the pathogenesis of autoimmune diseases and emphasize the potential value of combining electrophysiological approaches with immunological. . . molecular techniques in the study of autoimmunity. Our results provide for exploiting the abundance of type 1 K.sup.+ channels in \*\*CD4\*\*.sup.- CD8.sup.- T cells in testing the disease process. Investigation of the effects of type 1 K.sup.+ channel-specific drugs on the development of autoimmunity is made possible by this invention. Recent reports show that gamma/delta \*\*CD4\*\*.sup.- CD8.sup.- T cells respond to mycobacterial antigens and accumulate in leprosy skin lesions, cutaneous leishmaniasis, and rheumatoid arthritic joints (Modlin, . . . et al., Nature 339, 544 (1989); Holishitz, et al., Nature 339, 226 (1989)). By inducing the aggregation of monocytes, these \*\*CD4\*\*.sup.- CD8.sup.- T cells may

contribute to inflammatory processes (Modlin, et al., Nature 339, 544 (1989)). Alpha/beta TCR.sup.+ \*\*CD4\*\*.sup.- CD8.sup.- T cells have been reported to act as helper cells, inducing autoreactive B cells to secrete pathogenic anti-DNA antibodies (Datta, et al., J. Exp. Med. 165, 1252 (1987); Sainis and Datta, J. Immun. 140, 2215 (1988)). \*\*CD4\*\*.sup.- CD8.sup.- T cells have also been reported to abrogate oral \*\*tolerance\*\* (Kitamura, et al., J. Immunol. 139, 3251 (1987)). Collectively, these observations show that \*\*CD4\*\*.sup.- CD8.sup.- T cells apparently have a significant role in biologically relevant immune responses and apparently are involved in the mechanisms. . . . triggered by mitogens or antigens (e.g., E. coli or CFA), may induce abundant expression of type 1 K.sup.+ channels on \*\*CD4\*\*.sup.- CD8.sup.- T cells, regardless of the type of TCR they display on their cell surface.

US PAT NO: 5,126,433 [IMAGE AVAILABLE]

L3: 8 of 10

DETDESC:

DETD(17)

The . . . this invention also has utility as an inhibitor of T4.sup.+ cell function. Numerous studies suggest a critical role for the \*\*CD4\*\* receptor (\*\*CD4\*\* is general terminology for the human T4 receptor and its counterparts in other mammalian cells) in immune \*\*tolerance\*\*, particularly in the pathogenesis and progression of autoimmune diseases and in host specific graft rejection. Of particular relevance to sT4 are the observations with anti-\*\*CD4\*\* Mabs. Through their association with the \*\*CD4\*\* receptor, certain of these Mabs ameliorate autoimmune responses and graft rejection. Examples of such action include inhibition of T-cell function in vitro, for example, antigen induced proliferation, lymphokine secretion and helper cell function by certain anti-\*\*CD4\*\* Mabs; treatment of systemic lupus erythematosus by administration of anti-\*\*CD4\*\* Mabs to retard the onset of murine lupus; and grafting studies in mice wherein a single dose of murine Mab directed against the murine \*\*CD4\*\* receptor results in acceptance of the allograft.

US PAT NO: 5,110,906 [IMAGE AVAILABLE]

L3: 9 of 10

DETDESC:

DETD(10)

The . . . this invention also has utility as an inhibitor of T4.sup.+ cell function. Numerous studies suggest a critical role for the \*\*CD4\*\* receptor (\*\*CD4\*\* is general terminology for the human T4 receptor and its counterparts in other mammalian cells) in immune \*\*tolerance\*\*, particularly in the pathogenesis and progression of autoimmune diseases and in host specific graft rejection. Of particular relevance to sT4 are the observations with anti-\*\*CD4\*\* Mabs. Through their association with the \*\*CD4\*\* receptor, certain of these Mabs ameliorate autoimmune responses and graft rejection. Examples of such action include inhibition of T-cell function in vitro, for example, antigen induced proliferation, lymphokine secretion and helper cell function by certain anti-\*\*CD4\*\* Mabs; treatment of systemic lupus erythematosus by administration of anti-\*\*CD4\*\* Mabs to retard the onset of murine lupus; and grafting studies in mice wherein a single dose of murine Mab directed against the murine \*\*CD4\*\* receptor results in acceptance of the allograft.

=> d l3 4,8,9 fro

US PAT NO: 5,397,702 [IMAGE AVAILABLE] L3: 4 of 10  
 DATE ISSUED: Mar. 14, 1995  
 TITLE: Assay for and treatment of autoimmune diseases  
 INVENTOR: Michael D. Cahalan, Laguna Beach, CA  
 Kanianthara G. Chandy, Laguna Beach, CA  
 Stephan Grissmer, Irvine, CA  
 Sanjiu Ghanshani, Chino Hills, CA  
 George A. Gutman, Costa Mesa, CA  
 Brent A. Dethlefs, Fountain Valley, CA  
 ASSIGNEE: The Regents of the University of California, Oakland, CA  
 (U.S. corp.)  
 APPL-NO: 07/955,916  
 DATE FILED: Oct. 2, 1992  
 REL-US-DATA: Continuation-in-part of Ser. No. 668,609, Mar. 13, 1991,  
 abandoned, which is a continuation-in-part of Ser. No.  
 319,499, Mar. 6, 1989, abandoned.  
 FRN-PRIOR: World Intellectual Property Organization  
 PCT/US90/01197 Mar. 5, 1990  
 INT-CL: [6] C12P 21/06  
 US-CL-ISSUED: 435/69.1, 172.3, 6; 536/23.1, 23.5, 25.5  
 US-CL-CURRENT: 435/69.1, 6, 172.3; 536/23.1, 23.5, 25.5  
 SEARCH-FLD: 536/23.1, 23.5, 25.3; 530/350, 839; 424/570; 435/69.1,  
 172.3, 6; 436/149, 506, 501, 811, 815  
 REF-CITED:

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8906968	8/1989	World Intellectual Property Organization

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 Rettig et al, The EMBO Journal, vol. 11, No. 7, pp. 2473-2486, 1992.  
 ART-UNIT: 183  
 PRIM-EXMR: Christine M. Nucker  
 ASST-EXMR: Laurie Scheiner  
 LEGAL-REP: Walter H. Dreger

# ABSTRACT:

This disclosure relates to the general diagnosis and treatment of autoimmune diseases with materials identified in assays based upon the finding herein that such diseases manifest by elevated numbers of type 1 K<sup>sup</sup>+ channels in abnormal CD4<sup>sup</sup>- CD8<sup>sup</sup>- T cells.  
 5 Claims, 40 Drawing Figures

US PAT NO: 5,126,433 [IMAGE AVAILABLE] L3: 8 of 10  
 DATE ISSUED: Jun. 30, 1992  
 TITLE: Soluble forms of the T cell surface protein CD4  
 INVENTOR: Paul J. Maddon, New York, NY

Leonard Chess, Scarsdale, NY  
Richard Axel, New York, NY  
Robin Weiss, London, England  
Dan R. Littman, San Francisco, CA  
J. Steven McDougal, Atlanta, GA

ASSIGNEE: The Trustees of Columbia University in the City of New  
York, New York, NY (U.S. corp.)  
APPL-NO: 07/114,244  
DATE FILED: Oct. 23, 1987  
REL-US-DATA: Continuation-in-part of Ser. No. 898,587, Aug. 21, 1986,  
abandoned.  
INT-CL: [5] C07K 3/00; A61K 35/14  
US-CL-ISSUED: 530/395, 350, 380, 387.2, 389.1, 387.9  
US-CL-CURRENT: 530/395, 350, 380, 387.2, 387.9, 389.1  
SEARCH-FLD: 435/6; 536/27; 530/395, 386, 387  
REF-CITED:

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4,520,113	5/1985	Gallo et al.
4,621,054	11/1986	Suzuki et al.
4,629,783	12/1986	Cosand
4,663,436	5/1987	Elder et al.
4,761,371	8/1988	Bell et al.
4,816,567	3/1989	Cabilly et al.

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abstract No. 190738 (1985).  
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2481-2485 (1976).

ART-UNIT: 187  
PRIM-EXMR: Margaret Moskowitz  
ASST-EXMR: Scott A. Chambers  
LEGAL-REP: John P. White

#### ABSTRACT:

A single-stranded nucleic acid molecule which encodes an amino acid sequence comprising at least a portion of a T4 glycoprotein is provided. Additionally, amino acid sequences which comprise at least a portion of a T4 glycoprotein and are useful as a prophylaxis for treating a subject with acquired immune deficiency syndrome are provided. These amino acid

sequences, are capable of specifically forming a complex with a human immunodeficiency virus envelope glycoprotein and which are soluble in an aqueous solution. Monoclonal antibodies directed to the water-soluble amino acid sequences of the present invention may be used as vaccines for immunizing a subject against acquired immune deficiency syndrome.

2 Claims, 18 Drawing Figures

US PAT NO: 5,110,906 [IMAGE AVAILABLE] L3: 9 of 10  
DATE ISSUED: May 5, 1992  
TITLE: Derivatives of soluble T-4  
INVENTOR: Paul J. Maddon, New York, NY  
Richard Axel, New York, NY  
Raymond W. Sweet, Bala Cynwyd, PA  
James Arthos, Ann Arbor, MI  
ASSIGNEE: The Trustees of Columbia University in the City of New  
York, New York, NY (U.S. corp.)  
Smithkline Beckman Corporation, Philadelphia, PA (U.S.  
corp.)  
APPL-NO: 07/160,348  
DATE FILED: Feb. 24, 1988  
REL-US-DATA: Continuation-in-part of Ser. No. 114,244, Oct. 23, 1987,  
which is a continuation-in-part of Ser. No. 898,587,  
Aug. 21, 1986, abandoned.  
INT-CL: [5] C07K 13/00  
US-CL-ISSUED: 530/350; 435/5, 974; 530/395, 829; 930/221  
US-CL-CURRENT: 530/350; 435/5, 974; 530/395, 821; 930/221  
SEARCH-FLD: 530/387, 395, 350, 829; 930/221; 435/5, 974  
REF-CITED:

#### U.S. PATENT DOCUMENTS

4,520,113	5/1985	Gallo et al.	435/5
4,621,054	11/1986	Suzuki et al.	435/69
4,629,783	12/1986	Cosand	435/5
4,663,436	5/1987	Elder et al.	530/324

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8801304 2/1988 World Intellectual Property Organization

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Littman, D. R. et al., Chemical Abstracts, vol. 103, p. 175, col. 1, Abstract No. 190738 (1985).  
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Maddon, P. J. et al., Cell, vol. 42, pp. 93-104 (1985).  
Terhorst, C. et al., Science, vol. 209, pp. 520-521 (1980).  
Maddon, P. J. et al., Cell, vol. 47, pp. 333-348 (1986).  
McDougal, J. S. et al., J. of Immunology, pp. 2937-2944 (1986).  
Isobe, M. et al., Proc. Natl. Acad. Sci. U.S.A., vol. 83, pp. 4399-4402 (1986).  
Ratner, L. et al., Nature, vol. 313, pp. 277-284 (1985).  
Wong-Staal, F. et al., Nature, vol. 317, pp. 395-403 (1985).  
Klatzmann, D. et al., Nature, vol. 312, pp. 767-768 (1984).  
ART-UNIT: 187  
PRIM-EXMR: Christine Nucker  
LEGAL-REP: John P. White, Antoinette F. Konski

#### ABSTRACT:

This invention provides a therapeutic agent capable of specifically

forming a complex with human immunodeficiency virus envelope glycoprotein which comprises a polypeptide. In one embodiment of the invention, the amino acid sequence of the polypeptide comprises the amino acid sequence shown in FIG. 6 from about +1 to about +185 fused to the amino acid sequence from about +353 to about +371. In another embodiment of the invention, the amino acid sequence of the polypeptide comprises the amino acid sequence shown in FIG. 6 from about +1 to about +106 fused to the amino acid sequence from about +353 to about +371. In yet a further embodiment of the invention, the amino acid sequence of the polypeptide comprises the amino acid sequence shown in FIG. 6 from about +1 to about +185.

This invention also provides a method for treating a subject infected with a human immunodeficiency virus. The method comprises administering to the subject an effective amount of a pharmaceutical composition comprising an effective amount of a therapeutic agent of the invention and a pharmaceutically acceptable carrier.

3 Claims, 44 Drawing Figures

=> s cd4 and (non(w)deplet? or nondeplet?)

845 CD4

709585 NON

40946 DEPLET?

148 NON(W)DEPLET?

45 NONDEPLET?

L4 0 CD4 AND (NON(W)DEPLET? OR NONDEPLET?)

=> s (nondeplet? or non(w)deplet?) and antibod?

45 NONDEPLET?

709585 NON

40946 DEPLET?

148 NON(W)DEPLET?

18940 ANTIBOD?

L5 5 (NONDEPLET? OR NON(W)DEPLET?) AND ANTIBOD?

=> d l5 1-5

1. 5,229,275, Jul. 20, 1993, In-vitro method for producing antigen-specific human monoclonal \*\*antibodies\*\*; Diana K. Goroff, 435/70.1; 424/85.2; 435/70.21, 70.4, 240.2, 240.27; 530/351, 387.1, 388.1 [IMAGE AVAILABLE]

2. 5,169,937, Dec. 8, 1992, Method for producing stable glycosylated hemoglobin; Richard Smith, et al., 530/385; 436/67; 514/6 [IMAGE AVAILABLE]

3. 4,971,801, Nov. 20, 1990, Biologic response modifier; Richard W. Urban, 424/450; 264/4.3; 424/85.2, 282.1; 428/402.2; 436/829; 514/885 [IMAGE AVAILABLE]

4. 4,876,188, Oct. 24, 1989, Novel immunochemical method for assaying stable glycosylated hemoglobin; Richard Smith, et al., 435/7.25, 7.92, 28; 436/67, 512, 518, 536, 543, 548, 808, 811, 815, 825 [IMAGE AVAILABLE]

5. 4,322,680, Mar. 30, 1982, Chemically sensitive JFET transducer devices utilizing a blocking interface; Jiri Janata, et al., 324/71.2 [IMAGE AVAILABLE]

=> d l5 1-5

1. 5,229,275, Jul. 20, 1993, In-vitro method for producing antigen-specific human monoclonal \*\*antibodies\*\*; Diana K. Goroff, 435/70.1; 424/85.2; 435/70.21, 70.4, 240.2, 240.27; 530/351, 387.1, 388.1



[IMAGE AVAILABLE]

2. 5,169,937, Dec. 8, 1992, Method for producing stable glycosylated hemoglobin; Richard Smith, et al., 530/385; 436/67; 514/6 [IMAGE AVAILABLE]

3. 4,971,801, Nov. 20, 1990, Biologic response modifier; Richard W. Urban, 424/450; 264/4.3; 424/85.2, 282.1; 428/402.2; 436/829; 514/885 [IMAGE AVAILABLE]

4. 4,876,188, Oct. 24, 1989, Novel immunochemical method for assaying stable glycosylated hemoglobin; Richard Smith, et al., 435/7.25, 7.92, 28; 436/67, 512, 518, 536, 543, 548, 808, 811, 815, 825 [IMAGE AVAILABLE]

5. 4,322,680, Mar. 30, 1982, Chemically sensitive JFET transducer devices utilizing a blocking interface; Jiri Janata, et al., 324/71.2 [IMAGE AVAILABLE]

=>

begin 55,72,154,399,351

30aug97 14:17:27 User208760 Session D877.2  
\$0.00 0.004 Hrs File410  
\$0.00 Estimated cost File410  
\$0.00 Estimated cost this search  
\$0.03 Estimated total session cost 0.006 Hrs.

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See HELP FAQ 351 for reload info. British Apps faster - HELP NEWS 351.

Set	Items	Description
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? s (cd4 or cd8) and (non(w)deplet? or nondeplet?) and antibod?

Processing

	93850	CD4
	55688	CD8
	2593371	NON
	152783	DEPLET?
	252	NON(W)DEPLET?
	358	NONDEPLET?
	977382	ANTIBOD?
S1	192	(CD4 OR CD8) AND (NON(W)DEPLET? OR NONDEPLET?) AND ANTIBOD?

? rd s1

>>>Duplicate detection is not supported for File 351.

>>>Records from unsupported files will be retained in the RD set.

...examined 50 records (50)  
...examined 50 records (100)  
...examined 50 records (150)  
...completed examining records  
S2 90 RD S1 (unique items)  
? s s2 and human?

Processing

	90	S2
	9073718	HUMAN?
S3	32	S2 AND HUMAN?

? t s3/7/all

3/7/1 (Item 1 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)

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13658881 BIOSIS Number: 99658881

A **humanized** form of a **CD4**-specific monoclonal **antibody** exhibits decreased antigenicity and prolonged plasma half-life in rhesus monkeys while retaining its unique biological and antiviral properties  
Reimann K A; Lin W; Bixler S; Browning B; Ehrenfels B N; Lucci J;  
Miatkowski K; Olson D; Parish T H; Rosa M D; Oleson F B; Hsu Y M; Padlan E A; Letvin N L; Burkly L C

Division Viral Pathogenesis, Beth Israel Deaconess Med. Cent., RE-113,  
330 Brookline Ave., Boston, MA 02215, USA

AIDS Research and Human Retroviruses 13 (11). 1997. 933-943.

Full Journal Title: AIDS Research and Human Retroviruses

ISSN: 0889-2229

Language: ENGLISH

Print Number: Biological Abstracts Vol. 104 Iss. 005 Ref. 067280

Certain monoclonal **antibodies** (MAbs) directed against **CD4** can efficiently block HIV-1 replication in vitro. To explore **CD4**-directed passive immunotherapy for prevention or treatment of AIDS virus infection, we previously examined the biological activity of a **nondepleting CD4**-specific murine MAb, mu5A8. This MAb, specific for domain 2 of **CD4**, blocks HIV-1 replication at a post-gp120-**CD4** binding step. When administered to normal rhesus monkeys, all **CD4**+ target cells were coated with **antibody**, yet no cell clearance or measurable immunosuppression occurred. However, strong anti-mouse Ig responses rapidly developed in all monkeys. In the present study, we report a successfully **humanized** form of mu5A8 (hu5A8) that retains binding to both **human** and monkey **CD4** and anti-AIDS virus activity. When administered intravenously to normal rhesus monkeys, hu5A8 bound to all target **CD4**+ cells without depletion and showed a significantly longer plasma half-life than mu5A8. Nevertheless, an anti-hu5A8 response directed predominantly against V region determinants did eventually appear within 2 to 4 weeks in most animals. However, when hu5A8 was administered to rhesus monkeys chronically infected with the simian immunodeficiency virus of macaques, anti-hu5A8 **antibodies** were not detected. Repeated administration of hu5A8 in these animals resulted in sustained plasma levels and **CD4**+ cell coating with **humanized antibody** for 6 weeks. These studies demonstrate the feasibility of chronic administration of **CD4**-specific MAb as a potential means of treating or preventing HIV-1 infection.

3/7/2 (Item 2 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13627855 BIOSIS Number: 99627855

The immunological and pharmacodynamic effects of a **humanised non-depleting anti-CD4 monoclonal antibody** (mAb) in rheumatoid arthritis (RA)

Choy E H S; Connolly D J A; Regan T; Manna V K; Rapson N; Kingsley G H;  
Panayi G S; Johnston J M

Glaxo Wellcome, Beckenham, London, UK

British Journal of Rheumatology 36 (SUPPL. 1). 1997. 185.

Full Journal Title: XIVth Annual General Meeting of the British Society of Rheumatology, Harrogate, England, UK, April 23-25, 1997. British Journal of Rheumatology

ISSN: 0263-7103

Language: ENGLISH

Print Number: Biological Abstracts/RRM Vol. 049 Iss. 008 Ref. 134420

3/7/3 (Item 3 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13627731 BIOSIS Number: 99627731

The clinical effect of a by **humanised non-depleting**

anti-**CD4** monoclonal **antibody** (mAb) in rheumatoid arthritis (RA)

Panayi G S; Chov E H S; Connolly D J A; Manna V K; Regan T; Rapson N;  
Kingsley G H; Johnston J M

Rheumatology Unit, Guy's Hosp., UMDS, London, UK

British Journal of Rheumatology 36 (SUPPL. 1). 1997. 122.

Full Journal Title: XIVth Annual General Meeting of the British Society  
of Rheumatology, Harrogate, England, UK, April 23-25, 1997. British  
Journal of Rheumatology

ISSN: 0263-7103

Language: ENGLISH

Print Number: Biological Abstracts/RRM Vol. 049 Iss. 008 Ref. 134296

3/7/4 (Item 4 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13402315 BIOSIS Number: 99402315

T cell hypothesis in rheumatoid arthritis (RA) tested by **humanised non-depleting** anti-**CD4** monoclonal **antibody** (mAb)

treatment I: Suppression of disease activity and acute phase response

Panayi G S; Choy E H S; Connolly D J A; Manna V K; Regan T; Rapson N;  
Kingsley G H; Johnston J M

Rheumatology Unit, Guy's Hosp., UMDS, London, UK

Immunology 89 (SUPPL. 1). 1996. 92.

Full Journal Title: Joint Congress of the British Society for Immunology  
and the Biochemical Society, Harrogate, England, UK, December 10-13, 1996.  
Immunology

ISSN: 0019-2805

Language: ENGLISH

Print Number: Biological Abstracts/RRM Vol. 049 Iss. 003 Ref. 048954

3/7/5 (Item 5 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13402314 BIOSIS Number: 99402314

T cell hypothesis in rheumatoid arthritis (RA) tested by **humanised non-depleting** anti-**CD4** monoclonal **antibody** (mAb)

treatment II: Clinical activity is related to pharmacodynamic effects

Choy E H S; Connolly D J A; Regan T; Manna V K; Rapson N; Kingsley G H;  
Panayi G S; Johnston J M

Rheumatology Unit, Guy's Hosp., UMDS, London, UK

Immunology 89 (SUPPL. 1). 1996. 92.

Full Journal Title: Joint Congress of the British Society for Immunology  
and the Biochemical Society, Harrogate, England, UK, December 10-13, 1996.  
Immunology

ISSN: 0019-2805

Language: ENGLISH

Print Number: Biological Abstracts/RRM Vol. 049 Iss. 003 Ref. 048953

3/7/6 (Item 6 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13224264 BIOSIS Number: 99224264

T cell hypothesis in rheumatoid arthritis (RA) tested by **humanized non-depleting** anti-**CD4** monoclonal **antibody** (mAb)

treatment III: Immunological effects

Connolly D J A; Choy E H S; Rapson N; Regan T; Kingsley G H; Johnston J M

; Panayi G S  
Rheumatol. Unit, Guy's Hosp., UMDS, London, UK  
Arthritis & Rheumatism 39 (9 SUPPL.). 1996. S245.  
Full Journal Title: 60th National Scientific Meeting of the American  
College of Rheumatology and the 31st National Scientific Meeting of the  
Association of Rheumatology Health Professionals, Orlando, Florida, USA,  
October 18-22, 1996. Arthritis & Rheumatism  
ISSN: 0004-3591  
Language: ENGLISH  
Print Number: Biological Abstracts/RRM Vol. 048 Iss. 011 Ref. 203385

3/7/7 (Item 7 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13224263 BIOSIS Number: 99224263  
T cell hypothesis in rheumatoid arthritis (RA) tested by **humanized non-depleting anti-CD4 monoclonal antibody** (mAb)  
treatment II: Clinical activity is related to pharmacodynamic effects  
Choy E H S; Connolly D J A; Regan T; Manna V K; Rapson N; Kingsley G H;  
Panayi G S; Johnston J M  
Rheumatol. Unit, Guy's Hosp., UMDS, London, UK  
Arthritis & Rheumatism 39 (9 SUPPL.). 1996. S244.  
Full Journal Title: 60th National Scientific Meeting of the American  
College of Rheumatology and the 31st National Scientific Meeting of the  
Association of Rheumatology Health Professionals, Orlando, Florida, USA,  
October 18-22, 1996. Arthritis & Rheumatism  
ISSN: 0004-3591  
Language: ENGLISH  
Print Number: Biological Abstracts/RRM Vol. 048 Iss. 011 Ref. 203384

3/7/8 (Item 8 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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13224262 BIOSIS Number: 99224262  
T cell hypothesis in rheumatoid arthritis (RA) tested by **humanized non-depleting anti-CD4 monoclonal antibody** (mAb)  
treatment I: Suppression of disease activity and acute phase response  
Panayi G S; Choy E H S; Connolly D J A; Regan T; Manna V K; Rapson N;  
Kingsley G H; Johnston J M  
Rheumatol. Unit, Guy's Hosp., UMDS, London, UK  
Arthritis & Rheumatism 39 (9 SUPPL.). 1996. S244.  
Full Journal Title: 60th National Scientific Meeting of the American  
College of Rheumatology and the 31st National Scientific Meeting of the  
Association of Rheumatology Health Professionals, Orlando, Florida, USA,  
October 18-22, 1996. Arthritis & Rheumatism  
ISSN: 0004-3591  
Language: ENGLISH  
Print Number: Biological Abstracts/RRM Vol. 048 Iss. 011 Ref. 203383

3/7/9 (Item 9 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13223537 BIOSIS Number: 99223537  
Results of a placebo-controlled multicenter trial using a primatized  
**non-depleting, anti-CD4 monoclonal antibody** in the  
treatment of rheumatoid arthritis  
Levy R; Weisman M; Wisenhutter C; Yocum D; Schnitzer T; Goldman A; Schiff  
M; Leiden B F; Solinger A; MacDonald B; Lipani J  
Olympia, WA 98502, USA

Arthritis & Rheumatism 39 (9 SUPPL.). 1996. S122.

Full Journal Title: 60th National Scientific Meeting of the American College of Rheumatology and the 31st National Scientific Meeting of the Association of Rheumatology Health Professionals, Orlando, Florida, USA, October 18-22, 1996. Arthritis & Rheumatism

ISSN: 0004-3591

Language: ENGLISH

Print Number: Biological Abstracts/RRM Vol. 048 Iss. 011 Ref. 202658

3/7/10 (Item 10 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13031632 BIOSIS Number: 99031632

Immunological markers of response in a multi-dose protocol 7002 using an immunomodulating, **non-depleting** Primatized anti-**CD4** monoclonal **antibody** in rheumatoid arthritis (RA)

Solinger A; Paxton H; Wey K; Yocum D

IDEC Pharmaceuticals, San Diego, CA 92121, USA

FASEB Journal 10 (6). 1996. A1314.

Full Journal Title: Joint Meeting of the American Society for Biochemistry and Molecular Biology, the American Society for Investigative Pathology and the American Association of Immunologists, New Orleans, Louisiana, USA, June 2-6, 1996. FASEB Journal

ISSN: 0892-6638

Language: ENGLISH

Print Number: Biological Abstracts/RRM Vol. 048 Iss. 007 Ref. 125368

3/7/11 (Item 11 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

12165809 BIOSIS Number: 98765809

Immunological markers of response in a multi-dose protocol 7002 using an immunomodulating, **non-depleting** primatized-TM anti-**CD4** monoclonal **antibody** in rheumatoid arthritis (RA)

Solinger A; Paxton H; Wey K; Yocum D

IDEC Pharmaceuticals, San Diego, CA 92121, USA

FASEB Journal 10 (3). 1996. A442.

Full Journal Title: Experimental Biology 96, Part II, Washington, D.C., USA, April 14-17, 1996. FASEB Journal

ISSN: 0892-6638

Language: ENGLISH

Print Number: Biological Abstracts/RRM Vol. 048 Iss. 005 Ref. 082598

3/7/12 (Item 12 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

11935571 BIOSIS Number: 98535571

Modulation of mitogen and recall antigen proliferation by a **non-depleting**, anti-**CD4** monoclonal **antibody**: Results of a multi-dose study

Yocum D E; Mararescu M; Soundararajan D; Nordensson K; Solinger A M; Lipani J

Univ. Ariz., Tucson, AZ 85724, USA

Arthritis & Rheumatism 38 (9 SUPPL.). 1995. S280.

Full Journal Title: 59th National Scientific Meeting of the American College of Rheumatology and the 30th National Scientific Meeting of the Association of Rheumatology Health Professionals, San Francisco, California, USA, October 21-26, 1995. Arthritis & Rheumatism

ISSN: 0004-3591

3/7/13 (Item 13 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11935007 BIOSIS Number: 98535007

Treating rheumatoid arthritis with a **non-depleting** anti-  
**CD4** monoclonal **antibody** (MAB)

Moreland L W; Bucy R P; Knowles R W; Wacholtz M C; Haverty T P; Koopman W  
J

Univ. Alabama at Birmingham, Birmingham, AL, USA

Arthritis & Rheumatism 38 (9 SUPPL.). 1995. S186.

Full Journal Title: 59th National Scientific Meeting of the American  
College of Rheumatology and the 30th National Scientific Meeting of the  
Association of Rheumatology Health Professionals, San Francisco,  
California, USA, October 21-26, 1995. Arthritis & Rheumatism

ISSN: 0004-3591

Language: ENGLISH

Print Number: Biological Abstracts/RRM Vol. 047 Iss. 012 Ref. 204882

3/7/14 (Item 14 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11935003 BIOSIS Number: 98535003

Results of a multi-dose protocol 7002 using an immunomodulating,  
**non-depleting** PRIMATIZED anti-**CD4** monoclonal  
**antibody** in rheumatoid arthritis (RA)

Kaine J; Solinger A; Yocum D; Lipani J; Klas P; Tesser J; Wiesenhuber C;  
O'Sullivan F; Shuman S; Rigby W

Sarasota Arthritis Center, Sarasota, FL 34239, USA

Arthritis & Rheumatism 38 (9 SUPPL.). 1995. S185.

Full Journal Title: 59th National Scientific Meeting of the American  
College of Rheumatology and the 30th National Scientific Meeting of the  
Association of Rheumatology Health Professionals, San Francisco,  
California, USA, October 21-26, 1995. Arthritis & Rheumatism

ISSN: 0004-3591

Language: ENGLISH

Print Number: Biological Abstracts/RRM Vol. 047 Iss. 012 Ref. 204878

3/7/15 (Item 15 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11922318 BIOSIS Number: 98522318

Therapeutic monoclonal **antibodies**

Choy E H S; Panayi G S; Kingsley G H

Rheumatol. Unit, Div. Medicine, UMDS, 4th Floor, Hunt's House, Guy's  
Hospital, St. Thomas Street, London SE1 9RT, UK

British Journal of Rheumatology 34 (8). 1995. 707-715.

Full Journal Title: British Journal of Rheumatology

ISSN: 0263-7103

Language: ENGLISH

Print Number: Biological Abstracts Vol. 100 Iss. 011 Ref. 173175

Monoclonal **antibodies** have been used extensively over the last few  
years in clinical trials of rheumatoid arthritis (RA). Not only are they  
potential therapeutic agents, but they are also useful probes into the  
immunopathogenesis of RA. Anti-tumour necrosis factor alpha (TNF-alpha)  
monoclonal **antibodies** have been shown to be clinically efficacious.  
Although they produced rapid disease amelioration, the duration of clinical

improvement was limited to 4-6 weeks. Re-treatments were again effective but long-term studies are required to assess their therapeutic role in RA. So far, the therapeutic effects of lymphocyte-depleting **antibodies** have been disappointing. From the data, it is clear that synovial lymphocytes are more difficult to eliminate than peripheral blood lymphocytes and it is likely that in order to delete all synovial lymphocytes, high doses of depleting **antibodies** will be required which could lead to severe immunosuppression. Hence, lymphocyte depletion may not be a feasible therapeutic strategy. However, there are a number of clinical trials currently underway attempting to inhibit **CD4** lymphocyte function by **non-depleting antibodies**. In animal models of RA, such **antibodies** have been shown to induce long-term disease remission. Another possibility is to combine several monoclonal **antibodies** in order to induce disease remission in RA. This strategy has been used in murine collagen-induced arthritis in which a combination of anti-**CD4** and anti-TNF-alpha monoclonal **antibodies** was shown to be synergistic.

3/7/16 (Item 16 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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11760328 BIOSIS Number: 98360328

Activation of **CD4+** T cells in the presence of a **nondepleting** monoclonal **antibody** to **CD4** induces a Th2-Type response in vitro  
Stumbles P; Mason D

MRC Cellular Immunol. Unit, Sir William Dunn Sch. Pathol., University  
Oxford, South Parks Rd., Oxford OX1 3RE, UK

Journal of Experimental Medicine 182 (1). 1995. 5-13.

Full Journal Title: Journal of Experimental Medicine

ISSN: 0022-1007

Language: ENGLISH

Print Number: Biological Abstracts Vol. 100 Iss. 004 Ref. 052166

In vitro experiments using purified rat **CD4+** T cells in primary and secondary mixed leukocyte cultures (MLC) have been carried out to explore the mechanism of inhibition of cell-mediated autoimmune disease in the rat by a **nondepleting** monoclonal **antibody** (mAb) to **CD4**.

Previous work has shown that W3/25, a mouse anti-rat **CD4** mAb of immunoglobulin G1 isotype, completely prevents the development of the paralysis associated with experimental allergic encephalomyelitis (EAE) in Lewis rats, but does so without eliminating the encephalitogenic T cells. The in vitro experiments described in this study have shown that when **CD4+** T cells were activated in the presence of the anti-**CD4** mAb in a primary MLC, the synthesis of interferon (IFN) gamma, but not interleukin (IL) 2, was completely inhibited. After secondary stimulation, now in the absence of the mAb, the synthesis of IL-4 and IL-13 mRNA was greatly enhanced compared with that observed from **CD4+** T cells derived from primary cultures in which the mAb was omitted. As IL-4 and IL-13 are known to antagonize cell-mediated immune reactions, and as EAE is cell-mediated disease, the data suggest that the W3/25 mAb controls EAE by modifying the cytokine repertoire of T cells that respond to the encephalitogen. The capacity for the mAb to suppress IFN-gamma synthesis provides, in part, an explanation for this change in cytokine production. These findings are discussed in terms of what is known of the factors that determine which cytokine genes are expressed on T cell activation. Possible implications for the evolution of T cell responses in human immunodeficiency virus infection are also discussed.

3/7/17 (Item 17 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11345669 BIOSIS Number: 97545669



Immunological approach to inhibit formation of anti-**antibodies** to allo- and xenogeneic anti-T cell immunoglobulin

Mysliwicz J; Thierfelder S; Mocikat R; Kremmer E

GSF, Inst. Immunol., Marchioninistr. 25, D-81377 Muenchen, GER

European Journal of Immunology 24 (10). 1994. 2323-2328.

Full Journal Title: European Journal of Immunology

ISSN: 0014-2980

Language: ENGLISH

Print Number: Biological Abstracts Vol. 098 Iss. 012 Ref. 163292

Inhibitory anti-**antibodies** induced in patients by xenogeneic or even by **humanized** anti-T cell **antibodies** remain an unresolved problem. Mice also produce anti-**antibodies** following injection of xeno- or allogeneic anti-T cell **antibodies**. Here we report a principle based on sequentially applied anti-T cell **antibodies** generated in different species, which results in suppressed anti-**antibody** formation and prolonged immunosuppression. Thus, a single priming injection in mice of mouse (MmT1 or MmT5 differing by idiotypic only) or of rat (RmT1) anti-mouse Thy-1 monoclonal **antibodies** (mAb) or of rat anti-mouse L3T4 + Ly-2 (RmCD4 + **CD8**) mAb suppressed anti-**antibody** formation against subsequent booster injections of one of the above **antibodies**, provided that they differed in species origin from the priming **antibody**. Correspondingly, a sixfold and longer prolongation of 50 % survival of fully mismatched skin grafts was observed. Less or no anti-**antibody** suppression and little prolongation of graft survival was obtained if the 'first' and the 'second' (and following) **antibody** injections were of the same species, differing by iso- or idiotypic only. Finally, the suppressive principle did not manifest itself at all if the initial **antibody** injection included both the first and second **antibody**. These findings are discussed with reference to earlier studies on hapten/carrier effects as well as on immunosuppression attributed to '**non-depleting**' rat anti-**CD4/CD8** T cell **antibodies**.

3/7/18 (Item 18 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

10805769 BIOSIS Number: 97005769

T-cell recognition of a cross-reactive antigen(s) in erythrocytic stages of Plasmodium falciparum and Plasmodium yoelii: Inhibition of parasitemia by this antigen(s)

Lucas B; Engels A; Camus D; Haque A

Centre Immunol., Biol. Parasitaire, Inst. Pasteur, 59019 Lille, FRA

Infection and Immunity 61 (11). 1993. 4863-4869.

Full Journal Title: Infection and Immunity

ISSN: 0019-9567

Language: ENGLISH

Print Number: Biological Abstracts Vol. 097 Iss. 001 Ref. 005267

In the current study, we investigated the presence of a cross-reactive antigen(s) in the erythrocyte stage from Plasmodium yoelii (265 BY strain) and Plasmodium falciparum through recognition by T cells primed in vivo with antigens from each of these parasites. BALB/c mice are naturally resistant to P. falciparum but are susceptible to P. yoelii infection. Mice that had recovered from P. yoelii primary infection became resistant to a second infection. A higher in vitro proliferative response to a soluble blood stage preparation of P. falciparum was observed in splenic cells from immune animals than in those from mice with a patent P. yoelii infection. The antigen-induced proliferative response was enhanced when animals were exposed to a secondary infection. Animals exposed to a challenge infection were treated with anti-**CD4** or anti-**CD8** monoclonal **antibodies** to deplete the corresponding subset of T cells. There was a marked diminution in P. falciparum antigen-induced proliferative response in the total splenic cell populations from **CD8**-depleted but not from **CD4**-depleted mice. In **CD8**-depleted and **nondepleted**

animals, the antigen-induced proliferation in the total cell populations was markedly lower than in the T-cell-rich populations, indicating inhibitory activities of B cells and/or macrophages. There was no such difference in the stimulation between total and T-enriched cell populations from **CD4** -depleted animals. Flow cytometry analysis demonstrated the presence of an almost equal percentage of **CD8+** (59.6%) and **CD4+** (64%) T cells in the spleen preparations following in vivo depletion of **CD4-** and **CD8-**bearing T cells, respectively. When cultured with *P. yoelii* blood stage antigen, splenocytes from animals immunized with *P. falciparum* antigen displayed a significant proliferative response which was markedly diminished by treatment with anti-Thy-1.2 **antibody** plus complement. Animals immunized with *P. falciparum* antigen and then challenged with *P. yoelii* blood stage parasites displayed about a 50% lower level of parasitemia. These results demonstrated the existence of a cross-reactive antigen(s) between a murine and a **human** *Plasmodium* species, as determined from both in vivo and in vitro biological assays, and indicated the reactivity of mainly **CD8 +** T cells with this antigen.

3/7/19 (Item 19 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

8095291 BIOSIS Number: 91016291

RESISTANCE TO INFECTION BY HIV-1 OF PERIPHERAL BLOOD MONONUCLEAR CELLS FROM HIV-1-INFECTED PATIENTS IS PROBABLY MEDIATED BY NEUTRALIZING

**ANTIBODIES**

TREMBLAY M; NUMAZAKI K; LI X; GORNITSKY M; HISCOTT J; WAINBERG M A  
MCGILL AIDS CENTRE JEWISH GENERAL HOSP., 3755 COTE STE-CATHERINE ROAD,  
MONTREAL, QUEBEC H3T 1E2, CAN.

J IMMUNOL 145 (9). 1990. 2896-2901. CODEN: JOIMA

Full Journal Title: Journal of Immunology

Language: ENGLISH

We have investigated whether PBMC of HIV-1-seropositive subjects are as susceptible to in vitro infection by HIV-1 as are PBMC from seronegative controls. Accordingly, stimulated PBMC from 19 HIV-1-infected subjects were inoculated with four different variants of HIV-1. None of these cultures produced either detectable quantities of viral reverse transcriptase activity or p24 Ag following inoculation with HIV-1. In contrast, in five of six cases in which these PBMC were depleted of B cells by **antibody** plus complement prior to viral inoculation, the presence of viral reverse transcriptase and p24 Ag was detected. The presence of normal levels of **CD4** Ag at the surface of the **CD4+** cells in these populations was established by flow cytometry. Analysis by an immunoblot assay revealed that anti-HIV **antibodies** were present in the sera obtained from these infected donors; in addition, 7 of 10 culture fluids derived from the **nondepleted** PBMC were shown to contain virus-neutralizing **antibodies**. Cultures which were depleted of B cells did not contain detectable levels of antiviral **antibodies**. Confirmation that the virus produced by the PBMC which had been depleted of B cells was of the strain used to infect the cultures, rather than that which initially caused patient infection, was provided on the basis of differential susceptibility to **antibody** neutralization. These results suggest that **antibodies** produced by B cells in cultures of PBMC from seropositive donors may restrict infection by HIV-1 of such cultures under laboratory conditions.

3/7/20 (Item 20 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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7083977 BIOSIS Number: 88006722

ENDOGENOUSLY GENERATED ACTIVATED KILLER CELLS CIRCULATE AFTER AUTOLOGOUS

AND ALLOGENEIC MARROW TRANSPLANTATION BUT NOT AFTER CHEMOTHERAPY  
REITTIE J E; GOTTLIEB D; HESLOP H E; LEGER O; DEXLER H G; HAZLEHURST G;  
HOFFBRAND A V; PRENTICE H G; BRENNER M K  
DEP. HAEMATOL., ROYAL FREE HOSP., POND ST., LONDON, NW3, UK.  
BLOOD 73 (5). 1989. 1351-1358. CODEN: BLOOA  
Full Journal Title: Blood  
Language: ENGLISH

After marrow transplantation, major histocompatibility complex (MHC)-unrestricted natural killer (NK) lymphocytes are among the first cells to appear in the circulation. After T-cell-depleted bone marrow transplantation (TD-BMT), these cells have an activated pattern of target cell killing; they also secrete lymphokines including .gamma.-interferon (.gamma.-IFN), interleukin-2 (IL-2), and tumor necrosis factor (TNF) and may have a significant role as a primary defense against viral reactivation and in the elimination of residual host malignancy. We studied 43 patients with hematologic malignancy, treated by allogeneic TD-BMT, autologous **nondepleted** BMT, or chemotherapy alone to investigate (a) the mechanisms underlying the generation of these activated killer cells, (b) the range of conditions under which they are produced, and (c) their surface phenotype. We showed that .gamma.-IFN-secreting activated killer cells with the capacity to kill MHC-nonidentical NK-resistant targets are generated 4 to 6 weeks after either allogeneic TD-BMT or autologous BMT but do not appear after treatment with chemotherapy. Production therefore is not owing to T-cell depletion per se or to host donor alloreactivity, nor is it caused by stimulation by alloantigens contained in blood product support since no significant difference exists between allograft and chemotherapy patients in the number of units of blood platelet support given in the posttreatment period. Because most patients had no evidence of stimulation from virus reactivation/infection, the phenomenon of activation therefore appears to represent posttransplant immune dysregulation following repopulation of the host immune system with lymphoid subsets derived exclusively from blood and marrow. Activated killing is predominantly mediated by the CD16+ CD3- subset, but substantial activity remains in the CD16- CD3+ cell fraction. Monoclonal **antibodies** (MoAbs) that block interaction with class-I MHC molecules at the level of target cell (W6/32 anti-HLA class I) or effector cell (**CD8**) do not inhibit killing by CD16- CD3+ cells. Activated killer cells may contribute to the lower risk of relapse after marrow transplantation as compared with intensive chemotherapy.

3/7/21 (Item 21 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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5856041 BIOSIS Number: 83118348

A COMPARATIVE STUDY OF T-CELL DEPLETED AND **NON-DEPLETED**  
MARROW TRANSPLANTATION FOR HEMATOLOGICAL MALIGNANCY

ATKINSON K; ASHBY M; BIGGS J; CONCANNON A; COOLEY M; DODDS A; FARRELLY H;  
MORGAN G; O'FLAHERTY E; ET AL

BONE MARROW TRANSPLANT. UNIT, ST. VICENT'S HOSP., DARLINGHURST, NSW 2010.  
AUST N Z J MED 17 (1). 1987. 16-23. CODEN: ANZJB  
Full Journal Title: Australian and New Zealand Journal of Medicine  
Language: ENGLISH

Sixteen patients with hematological malignancy received cyclophosphamide (120 mg/kg), fractionated total body irradiation (12 Gy), oral cyclosporin, and an HLA-identical sibling marrow transplant depleted of T cells by incubation with the monoclonal **antibody** antiHuLy-m1 (CD2) and rabbit complement with (five patients) or without (11 patients) anti-HuLy-m8 (**CD8**). These 16 patients were compared historically to 84 patients with hematological malignancy receiving cyclophosphamide (120 mg/kg), fractionated total body irradiation (12 or 14 Gy), oral cyclosporin, and unmanipulated HLA-identical sibling marrow, for parameters of engraftment and graft-versus-host disease (GVHD). Graft failure occurred in one of the 16 T-cell depleted recipients and in one of the 84 **non-depleted**

recipients. Engraftment was slightly but significantly slower in the T-cell depleted group and bacterial infections significantly more frequent and severe than in the unmanipulated group. There was a suggestion that the severity of acute GVHD was reduced in those receiving T depleted marrow. Randomized trials will be necessary to determine if marrow T-cell depletion results in superior long-term leukemia-free survival.

3/7/22 (Item 1 from file: 72)  
DIALOG(R) File 72:EMBASE  
(c) 1997 Elsevier Science B.V. All rts. reserv.

9787616 EMBASE No: 95351540

T-cell regulation

Choy E.H.S.; Kingsley G.H.; Panayi G.S.

UMDS, Rheumatology Unit, Guy's Hospital, St Thomas Street, London SE1 9RT  
United Kingdom

Bailliere's Clinical Rheumatology (United Kingdom) , 1995, 9/4 (653-671)

CODEN: BCRHE ISSN: 0950-3579

LANGUAGES: English SUMMARY LANGUAGES: English

There is considerable evidence to implicate T cells in the pathogenesis of rheumatoid arthritis (RA). They initiate and sustain inflammation and therefore are attractive targets for immunotherapy. Several strategies targeting T cells have been tried in RA. The use of monoclonal **antibodies** to deplete T cells has been used extensively but with little success. Studies have shown that T cell depleting **antibodies** produce profound peripheral blood lymphopenia but they are less effective in depleting lymphocytes in the joint. Since clinical efficacy is likely to depend on depleting almost all synovial lymphocytes, high doses of monoclonal **antibodies** would have to be given. However, the invariably severe peripheral blood lymphopenia induced by such a regimen is likely to result in profound immunosuppression. Therefore, this strategy has been abandoned and recent attempts have been made to induce tolerance in RA. In animal models of RA, treatment with high dose **non-depleting** anti-**CD4** monoclonal **antibody** protects them from arthritis induced by injection of streptococcal cell wall. In addition, it leads to a state of anergy which protects the animals from arthritis induction without further treatment with anti-**CD4** monoclonal **antibody**. This is currently being used in clinical trials of RA. Other tolerance inducing treatment strategies include T cell or T cell receptor vaccination and oral tolerance. The former is particularly difficult since the rheumatoid arthritogenic antigen and the pathogenic T cell remain unknown. The latter has shown promise in placebo controlled trials although the ideal dosage remains unknown. The mechanism of action of oral tolerance involves either immunosuppressive T cell cytokines, T cell anergy or depletion.

3/7/23 (Item 2 from file: 72)  
DIALOG(R) File 72:EMBASE  
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9532547 EMBASE No: 95106020

Anti-**CD4** monoclonal **antibody** immune intervention in patients  
with newly diagnosed Type I (insulin-dependent) diabetes mellitus

Helmke B.; Kuttler B.; Laube F.; Gens E.; Michaelis D.; Hahn H.-J.;  
Schulze-Koops H.; Emmrich F.

Institute Diabetes 'Gerhardt Katsch', Dept Experimental Clin  
Endocrinology, D-17495 Karlsburg Germany

Diabetes, Nutrition and Metabolism - Clinical and Experimental (Italy) ,  
1994, 7/5 (273-280) CODEN: DNME ISSN: 0394-3402

LANGUAGES: English SUMMARY LANGUAGES: English

A randomized controlled trial was conducted to determine if anti-**CD4** monoclonal **antibody** (mAb) together with prednisolone immunotherapy could improve or prolong clinical remission in children with newly diagnosed insulin-dependent (Type I) diabetes mellitus. Eleven

children entered the trial within 1 week of initiation of insulin therapy and were followed-up for 1 year. Five of them were assigned to the treatment group, the control group comprised 6 children receiving insulin therapy only. Baseline clinical and metabolic data did not differ significantly in the two groups of patients. In addition to insulin therapy, the treatment group received infusions of anti-CD4 mAb MAX.16H5 at a dose of 0.5 mg/kg/day for 5 consecutive days plus daily prednisolone at a dose of 1.0 mg/kg/day (5 days i.v., 5 days oral). Moderate depletion of CD4+ blood cells and marked decreases of the mean CD4 antigen density on the surfaces of non-depleted CD4+ cells occurred 24h after the first anti-CD4 mAb/prednisolone infusion in all treated children. Complete reappearance of CD4+ blood cells was seen at 3 months of follow-up whereas CD4+ antigen expression rapidly regained pretreatment levels within 2 weeks after termination of immunotherapy. Only 2 patients developed low levels of human anti-mouse immunoglobulin antibodies (HAMAs) 3-12 weeks after they had received mouse mAb 16H5. Both groups of patients displayed elevated levels of activated T lymphocytes (HLA-DR+CD3+) that were not affected by immunotherapy. Clinically, insulin requirement and glycated hemoglobin (HbA1) concentrations did not differ among the patient groups, neither at diagnosis nor at quarterly intervals during the 1-year follow-up. Fasting levels of plasma C-peptide increased in 3 patients immediately after administration of anti-CD4 mAb (day 6), but this initial improvement of residual beta-cell function was no longer detectable after day 10. Thereafter insulin requirement and fasting C peptide did not differ between the two groups of patients. Plasma C-peptide achieved levels of about 300 pmol/l. Only in one patient who also developed the highest HAMA response plasma C-peptide rose to about 700 pmol/l at 6 months of follow-up. In this patient (fm, 8yr), improvement of residual beta-cell function was accompanied by a gradual decrease of the insulin requirement from 0.81 IU/kg/day at clinical diagnosis down to 0.26 IU/kg/day by the end of the 1-year post-treatment observation period. In the present study, apparently all patients have benefited from intensified insulin therapy initiated immediately after clinical diagnosis and from maintenance of strict metabolic control during follow-up. However, a single course of anti-CD4 /prednisolone immunotherapy does not generally result in additional clinical benefits.

3/7/24 (Item 3 from file: 72)  
DIALOG(R)File 72:EMBASE  
(c) 1997 Elsevier Science B.V. All rts. reserv.

8675097 EMBASE No: 92355607

Anti-CD4 monoclonal antibodies in therapy: Creation of nonclassical tolerance in the adult

Shizuru J.A.; Alters S.E.; Fathman C.G.

Stanford Univ. School of Medicine, Div. of Rheumatology and Immunology, Stanford, CA 94305 USA

IMMUNOL. REV. (Denmark) , 1992, -/129 (105-130) CODEN: IMRED ISSN: 0105-2896 ADONIS ORDER NUMBER: 010528969200046X

LANGUAGES: English SUMMARY LANGUAGES: English

We have described the studies from our laboratory which demonstrate that depleting anti-CD4 mAb induce tolerance to foreign antigens in adult, euthymic animals. Further, we have proposed that such tolerance occurs as a result of new thymic migrants encountering antigens in the periphery. However, these conclusions can be considered only partial since we (Song et al. in press) and others have shown that depletion of T cells per se does not permit tolerance. For example, anti-Thy-1 or anti-Lyt-1 are themselves immunosuppressive and able to deplete T cells, yet they elicit strong anti-globulin responses against themselves and do not permit tolerance to be induced either to transplants or administered soluble protein antigen. We have recently found that while the combination of anti-CD4 and anti-CD8 mAb allows long-term survival of allografted islets in mice, anergy in the relevant T-cell subsets was not found (in contrast to what is

found with anti-CD4 mAb treatment alone) (Song et al. in press). In this instance, long-term survival was probably the result of changes in graft immunogeneity (i.e., migration of passenger leukocytes) since the kinetics of repopulation were much delayed in the anti-CD4 and -CD8 treated mice. As discussed elsewhere in this volume, interesting studies from several laboratories suggest that **non-depleting** anti-CD4 mAb can generate unresponsiveness in a variety of systems. In reviewing the literature it is clear that the success of **non-depleting** reagents appears to be dependent upon the model system tested. For example, although depleting and **nondepleting** CD4 mAb regimens produced comparable prolongation of cultured fetal pancreas allografts in mice (Charlton and Mandel), almost total elimination of circulating CD4+ cells did not prevent acute rejection of murine skin grafts (Auchincloss et al. 1988). This heterogeneity is not surprising given the multiple functional roles of the CD4 molecule and the cells that bear this molecule. In addition to depletion, **antibodies** directed against CD4 can potentially affect CD4+ cell function by (1) direct blockade or failure to augment the formation of the TCR-antigen/MHC ternary complex or (2) by transmitting a negative signal to the CD4 T cell or interfering with normal signal transduction mechanisms. Undoubtedly, it is a combination of mechanisms that allows these **antibodies** their immunosuppressive effects. What can be said with certainty is that these **antibodies** will continue to be important tools for understanding the molecular and cellular basis of the immune response, and will soon emerge as invaluable therapeutic agents in the clinical arena.

3/7/25 (Item 4 from file: 72)  
DIALOG(R)File 72:EMBASE  
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8183556 EMBASE No: 91209639

Monoclonal **antibody** therapy for the induction of transplantation tolerance

Cobbold S.P.

Division of Immunology, Cambridge University Department of Pathology, Tennis Court Road, Cambridge CB1 2QP United Kingdom

IMMUNOL. LETT. (Netherlands), 1991, 29/1-2 (117-122) CODEN: IMLED  
ISSN: 0165-2478 ADONIS ORDER NUMBER: 016524789100175N

LANGUAGES: English

There are three ways in which monoclonal **antibodies** could be used to facilitate the induction of tolerance to foreign tissues after organ transplantation. First, depleting monoclonal **antibodies** could be directed against the T cells responsible, thereby reducing their number and acting to non-specifically immunosuppress the patient. This is generally not sufficient to allow tolerance induction in the T cells which repopulate the periphery. Second, depleting monoclonal **antibodies** could be used to remove donor passenger leukocytes and antigen-presenting cells from the donor organ, which may both reduce immunogenicity and increase the chance of tolerance induction. Third, **non-depleting**, but functionally blocking, monoclonal **antibodies** to T cell molecules such as CD4 and CD8 can allow the specific induction of transplantation tolerance in mouse models, an approach which might be applicable to man, not only for organ transplantation, but also in the treatment of autoimmune diseases. These three approaches are, in time, likely to complement each other in clinical practice. Monoclonal **antibodies** can be tailored to each approach by choosing appropriate specificities and isotypes, and further refinements can be made where necessary by making monovalent or **humanised antibodies**. The application of each of these approaches to clinical therapy is described.

3/7/26 (Item 5 from file: 72)  
DIALOG(R)File 72:EMBASE

8013038 EMBASE No: 91038466

Induction of tolerance in peripheral T cells with monoclonal **antibodies**

Qin S.; Wise M.; Cobbold S.P.; Leong L.; Kong Y.-C.M.; Parnes J.R.; Waldmann H.

Division of Immunology, Department of Pathology, Cambridge University, Cambridge CB2 2QQ United Kingdom

EUR. J. IMMUNOL. (Germany, Federal Republic of) , 1990, 20/12 (2737-2745)  
CODEN: EJIMA ISSN: 0014-2980

LANGUAGES: English

Our goal has been to develop ways to tolerize the mature immune system to any defined antigen. In this report we show that peripheral (post-thymic) T cells of mice can become tolerant to a range of antigens (**human** and rat immunoglobulins, and bone marrow and skin grafts that differ at multiple minor transplantation antigens). In the case of **human** gamma globulin (HGG), this required that the antigen be given under the cover of a short course of **non-depleting anti-CD4 antibody**, while for tolerance to skin and marrow grafts **anti-CD8 antibody** was also required. Tolerance to HGG could be reinforced by repeated injections of HGG, but was lost in the absence of any further exposure to antigen. This reversal of tolerance with time was due to new T cells being exported from the thymus, as it was not observed in tolerized, adult thymectomized mice. In contrast, tolerance to marrow and skin grafts was permanent, presumably because the established grafts acted as a continuous source of antigen to reinforce the tolerant state. Tolerance could not be broken by the infusion of unprimed spleen cells and in one example (tolerance to Mls-1a) there was clear evidence that specific peripheral T cells were anergic. We propose that anergic cells may themselves participate in reinforcing the tolerant state by competing at sites of antigen presentation.

3/7/27 (Item 1 from file: 154)

DIALOG(R) File 154:MEDLINE(R)

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08554040 96161423

Innovative treatment approaches for rheumatoid arthritis. T-cell regulation.

Choy EH; Kingsley GH; Panayi GS

UMDS, Rheumatology Unit, Guy's Hospital, London, UK.

Baillieres Clin Rheumatol (ENGLAND) Nov 1995, 9 (4) p653-71, ISSN 0950-3579 Journal Code: CRY

Languages: ENGLISH

Document type: JOURNAL ARTICLE; REVIEW; REVIEW, TUTORIAL

There is considerable evidence to implicate T cells in the pathogenesis of rheumatoid arthritis (RA). They initiate and sustain inflammation and therefore are attractive targets for immunotherapy. Several strategies targeting T cells have been tried in RA. The use of monoclonal **antibodies** to deplete T cells have been used extensively but with little success. Studies have shown that T cell depleting **antibodies** produce profound peripheral blood lymphopenia but they are less effective in depleting lymphocytes in the joint. Since clinical efficacy is likely to depend on depleting almost all synovial lymphocytes, high doses of monoclonal **antibodies** would have to be given. However, the invariably severe peripheral blood lymphopenia induced by such a regimen is likely to result in profound immunosuppression. Therefore, this strategy has been abandoned and recent attempts have been made to induce tolerance in RA. In animal models of RA, treatment with high dose **non-depleting anti-CD4 monoclonal antibody** protects them from arthritis induced by injection of streptococcal cell wall. In addition, it leads to a state of anergy which protects the animals from arthritis induction without further treatment with anti-CD4 monoclonal **antibody**. This is

currently being used in clinical trials of RA. Other tolerance inducing treatment strategies include T cell or T cell receptor vaccination and oral tolerance. The former is particularly difficult since the rheumatoid arthritogenic antigen and the pathogenic T cell remain unknown. The latter has shown promise in placebo controlled trials although the ideal dosage remains unknown. The mechanism of action of oral tolerance involves either immunosuppressive T cell cytokines, T cell anergy or depletion. (76 Refs.)

3/7/28 (Item 2 from file: 154)

DIALOG(R) File 154:MEDLINE(R)

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07419561 92368404

The forces driving autoimmune disease.

Roitt IM; Hutchings PR; Dawe KI; Sumar N; Bodman KB; Cooke A  
Dept. of Immunology, University College & Middlesex School of Medicine,  
London, UK.

J Autoimmun (ENGLAND) Apr 1992, 5 Suppl A p11-26, ISSN 0896-8411  
Journal Code: ADL

Languages: ENGLISH

Document type: JOURNAL ARTICLE; REVIEW; REVIEW, TUTORIAL

There are two classes of autoimmune disease, organ-specific and non-organ specific or systemic. That cells producing autoantibodies are selected by antigen is strongly suggested by the presence of mutations and high affinity **antibody**. T-cells are pivotal in all forms of autoimmunity as evidenced by the therapeutic benefit of anti-T-cell monoclonals such as anti-**CD4**, and the frequent development of high affinity IgG autoantibodies. The production of anergic T-cells by the use of **non-depleting** anti-**CD4** in the presence of antigen is discussed with particular reference to its potential for immunological intervention in autoimmune disease. It is possible to identify T-cell epitopes in organ-specific autoimmunity using pathogenic T-cell clones or hybridomas to identify the peptide sequences which are reactive. Antigen-specific therapy may ultimately be based on such peptide epitopes. The specificity of the T-cells in systemic autoimmunity is still obscure, but there is some evidence that reactivity with certain germ-line idiotypes can lead to the development of systemic autoimmunity. The possibility of stimulating B-cells specific for auto-antigens such as DNA becomes feasible if a complex of **antibody** and DNA is taken up by these specific B-cells and processed idiomorph is presented to T-helpers specific for those idiomorph epitopes. Evidence is presented that there may be pre-existing defects in the target organ in certain organ-specific disorders, and the evidence for a glycosylation defect in the IgG in patients with rheumatoid arthritis is explored. It is noted that the spouses of probands with rheumatoid arthritis is explored. It is noted that the spouses of probands with rheumatoid arthritis also tend to have this glycosylation defect and this raises the possibility of an effect due to an environmental factor, such as a microbial infection. Molecular mimicry of autoantigens by microbes can stimulate autoreactive cells by their cross-reactivity. It is emphasized that cross-reaction which gives rise to the priming of autoreactive T-cells could give rise to the establishment of a chronic autoimmune state. In animals with normal regulatory immune systems, such induced autoimmunity is ultimately corrected and it is only in animals where there are defects in regulation, that autoimmunity persists. Thus, there are many factors giving rise to autoimmunity, and the diseases are rightly regarded as multifactorial in origin. (22 Refs.)

3/7/29 (Item 3 from file: 154)

DIALOG(R) File 154:MEDLINE(R)

(c) format only 1997 Knight-Ridder Info. All rts. reserv.

06620943 91370929

Reprogramming the immune system for tolerance with monoclonal



**antibodies.**

Cobbold SP; Qin SX; Waldmann H  
Department of Pathology, Cambridge University, UK.  
Semin Immunol (UNITED STATES) Nov 1990, 2 (6) p377-87, ISSN 1044-5323  
Journal Code: A61

Languages: ENGLISH

Document type: JOURNAL ARTICLE; REVIEW; REVIEW, TUTORIAL

Monoclonal **antibodies** to **CD4**, **CD8** and **CD11a** can be used in vivo either to deplete or functionally block T cells to create a tolerance permissive environment. Short courses of **non-depleting CD4 and CD8 antibodies** were used to induce tolerance separately in **CD4+** and **CD8+** T cells either to foreign immunoglobulins, bone marrow, or skin grafts. Tolerance was obtained to minor (non-MHC) transplantation antigens without T cell depletion even in actively sensitized mice, or to MHC plus minor antigens presented directly by skin grafts using combinations of depleting followed by blocking **CD4 and CD8 antibodies**. In all cases, tolerance was specific to the antigen/tissue given under cover of **antibody** treatment, and in one example it could be shown that T cells directed to MLS-1a had been forced into an anergic state. This induction of tolerant, anergic T cells in the periphery is able to explain many of the features associated with tolerance, not only in the model systems using foreign antigens, but also in the normal regulation of anti-self responses and its failure in autoimmune diseases. It is our new found ability to use antigen under the cover of **antibody** treatment to accurately control the pattern of tolerant T cells in vivo that we refer to by using the term 'reprogramming'. We also describe the clinical treatment of one patient with an autoimmune vasculitis based on the ideas developed from the mouse models. (47 Refs.)

3/7/30 (Item 1 from file: 351)  
DIALOG(R) File 351:DERWENT WPI  
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011033929

WPI Acc No: 97-011853/199701

Amt. of **non-depleting anti-CD4 antibody** effective to induce immunological tolerance - useful to inhibit allo-graft rejection in primate subject, specifically bone marrow allo-graft  
Patent Assignee: JOHNSON & JOHNSON CORP (JOHJ )

Inventor: CAVENDER D E; KNOWLES R W; THOMAS J M

Number of Countries: 069 Number of Patents: 002

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Main IPC	Week
WO 9636359	A1	19961121	WO 96US6912	A	19960516	A61K-039/395	199701 B
AU 9657479	A	19961129	AU 9657479	A	19960516	A61K-039/395	199712

Priority Applications (No Type Date): US 95443739 A 19950518  
Cited Patents: 5. journal ref.; EP 240344; WO 9109966; WO 9205274  
Patent Details:

Patent	Kind	Lan	Pg	Filing Notes	Application	Patent
WO 9636359	A1	E	17			

Designated States (National): AL AM AT AU AZ BB BG BR BY CA CH CN CZ DE  
DK EE ES FI GB GE HU IS JP KE KG KP KR KZ LK LR LS LT LU LV MD MG MK MN  
MW MX NO NZ PL PT RO RU SD SE SG SI SK TJ TM TR TT UA UG UZ VN

Designated States (Regional): AT BE CH DE DK EA ES FI FR GB GR IE IT KE  
LS LU MC MW NL OA PT SD SE SZ UG

AU 9657479 A Based on WO 9636359

Abstract (Basic): WO 9636359 A

Amt. of a **non-depleting anti-CD4 antibody**  
(Ab), pref. a **humanised** cdr-grafted Ab, effective to induce immunological tolerance, further comprises donor bone marrow.  
USE - The Ab, esp. administered in an amt. sufficient to maintain

lymphocyte **CD4** saturation (partic. 5 mg/kg) for a sufficient period to permit immunological tolerance induction, can be used to inhibit allograft rejection in a primate subject, specifically a bone marrow allograft (claimed).

Dwg.0/2

Derwent Class: B04

International Patent Class (Main): A61K-039/395

International Patent Class (Additional): C07K-016/28

3/7/31 (Item 2 from file: 351)

DIALOG(R)File 351:DERWENT WPI

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009140953

WPI Acc No: 92-268391/199232

Use of single **non-depleting CD4** monoclonal

**antibody** - for treatment of insulin-dependent diabetes mellitus (IDDM), arrests loss of insulin producing cells

Patent Assignee: UNIV COLLEGE LONDON (UNLO )

Inventor: COOKE A; WALDMANN H

Number of Countries: 035 Number of Patents: 005

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Main IPC	Week
WO 9211869	A1	19920723	WO 92GB74	A	19920114	A61K-039/395	199232 B
AU 9211647	A	19920817	AU 9211647	A	19920114	A61K-039/395	199245
			WO 92GB74	A	19920114		
EP 567490	A1	19931103	EP 92902288	A	19920114	A61K-039/395	199344
			WO 92GB74	A	19920114		
JP 6504283	W	19940519	JP 92502777	A	19920114	A61K-039/395	199424
			WO 92GB74	A	19920114		
AU 668081	B	19960426	AU 9211647	A	19920114	A61K-039/395	199624

Priority Applications (No Type Date): GB 91741 A 19910114

Cited Patents: 4. journal ref.

Patent Details:

Patent	Kind	Lan	Pg	Filing	Notes	Application	Patent
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WO 9211869	A1	E	19				
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Designated States (National): AT AU BB BG BR CA CH DE DK ES FI GB HU JP KP KR LK LU MG MW NL NO PL RO RU SD SE US

Designated States (Regional): AT BE CH DE DK ES FR GB GR IT LU MC NL OA SE

AU 9211647	A			Based on		WO 9211869	
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EP 567490	A1	E		Based on		WO 9211869	
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Designated States (Regional): AT BE CH DE DK ES FR GB GR IT LI LU MC NL SE

JP 6504283	W		5	Based on		WO 9211869	
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AU 668081	B			Previous Publ.		AU 9211647	
				Based on		WO 9211869	

Abstract (Basic): WO 9211869 A

Use of a **non-depleting CD4** monoclonal

**antibody** (MAb), (A), in the prepn. of a medicament for treating insulin-dependent diabetes mellitus (IDDM) in **humans** or animals is new.

Also claimed is the treatment method using an effective, non-toxic amt. of (A); and a pharmaceutical compsn. comprising no less than (A) and a diluent or carrier.

ADVANTAGE - (A) arrests the loss of insulin-producing cells and allows regeneration of beta cells, to reverse the course of the disease. Ideally, treatment with (A) commences soon after the disease has become potent, so the patient retains the majority of beta cells. However, even when the disease has progressed, (A) is beneficial in protecting remaining beta cells. Treatment comprises not less than 1 dose of (A) and pref. a course of several doses.

In humans, doses of 400 micro g-1 mg (A), esp. 5-20 mg in an otherwise healthy adult of ca. 75 kg are used. A saturating amt. of (A) is us

Dwg. 0/0

Derwent Class: B04

International Patent Class (Main): A61K-039/395

3/7/32 (Item 3 from file: 351)  
DIALOG(R) File 351:DERWENT WPI  
(c)1997 Derwent Info Ltd. All rts. reserv.

008503137

WPI Acc No: 91-007221/199101

**Non-depleting CD4 and CD8 monoclonal antibodies** - for inducing tolerance to foreign antigens in transplant rejection, auto-immune disease, etc  
Patent Assignee: COBBOLD S P (COBB-I); WALDMANN H (WALD-I); WELLCOME FOUND LTD (WELL )

Inventor: COBBOLD S P; WALDMANN H

Number of Countries: 024 Number of Patents: 013

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Main IPC	Week
WO 9015152	A	19901213				B	199101 B
PT 94214	A	19910208				B	199109
AU 9057258	A	19910107				B	199115
EP 474691	A	19920318	EP 90908270	A	19900531	B	199212
ZA 9004174	A	19920226	ZA 904174	A	19900530	B	199213
DD 296843	A5	19911219	DD 341218	A	19900531	B	199221
JP 4505919	W	19921015	JP 90508030	A	19900531	B	199248
			WO 90GB840	A	19900531		
HU 61341	T	19921230	HU 905134	A	19900531	B	199306
			WO 90GB840	A	19900531		
AU 657255	B	19950309	AU 9057258	A	19900531	B	199520
EP 474691	B1	19961113	EP 90908270	A	19900531	B	199650
			WO 90GB840	A	19900531		
DE 69029134	E	19961219	DE 629134	A	19900531	B	199705
			EP 90908270	A	19900531		
			WO 90GB840	A	19900531		
ES 2096588	T3	19970316	EP 90908270	A	19900531	B	199718
NZ 233889	A	19970624	NZ 233889	A	19900531	B	199732

Priority Applications (No Type Date): GB 8912497 A 19890531

Cited Patents: 4. journal ref.

Patent Details:

Patent	Kind	Lan	Pg	Filing Notes	Application	Patent
WO 9015152	A					
				Designated States (National): AU CA FI HU JP KR US		
				Designated States (Regional): AT BE CH DE DK ES FR GB IT LU NL SE		
EP 474691	A		44			
				Designated States (Regional): AT BE CH DE DK ES FR GB IT LI LU NL SE		
ZA 9004174	A		57			
JP 4505919	W		19	Based on	WO 9015152	
HU 61341	T			Based on	WO 9015152	
AU 657255	B			Previous Publ.	AU 9057258	
				Based on	WO 9015152	
EP 474691	B1 E		32	Based on	WO 9015152	
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DE 69029134	E			Based on	EP 474691	
				Based on	WO 9015152	
ES 2096588	T3			Based on	EP 474691	

Abstract (Basic): WO 9015152 A

**Non depleting CD4 and CD8 monoclonal antibodies** are claimed for use in inducing tolerance to an

antigen. The use of these **antibodies** and packs contg. them are also claimed. The prods. may also contain a depleting **CD4** monoclonal **antibody** and/or a depleting **CD8** monoclonal **antibody**.

Single dose for a **human** is 1-400mg (esp. 3-30mg) of **antibody**. Admin. is parenteral e.g. intravenous.

USE/ADVANTAGE - For producing tolerance to foreign immunoglobulins, bone marrow and skin grafts. To treat autoimmune diseases without the need for long term chemotherapy and to produce tolerance to therapeutic polypeptides such as interferon, IL-II or TNF. (44pp Dwg.No.0/13

Abstract (Equivalent): EP 474691 B

Use of a **non-depleting** anti-**CD4** monoclonal **antibody**, ie an **antibody** which causes depletion of fewer than 50% of **CD4+** T-cells from the periphery as measured by changes in the peripheral blood lymphocyte numbers, for the manufacture of a medicament for the induction of a state of immunological tolerance to an antigen by a method which comprises administering said **non-depleting** anti-**CD4** monoclonal **antibody** to a subject together with a **non-depleting** anti-**CD8** monoclonal **antibody**, ie an **antibody** which causes depletion of fewer than 50% of **CD8+** T-cells from the periphery as measured by changes in the peripheral blood lymphocyte numbers, to induce an immunological tolerance permissive environment within said subject by means of said **antibodies** in the presence of said antigen.

Dwg.0/11b

Derwent Class: B04; D16

International Patent Class (Main): A61K-039/395; C12P-021/08

International Patent Class (Additional): A61K-039/39; C07K-015/28;

ds

Set	Items	Description
S1	192	(CD4 OR CD8) AND (NON(W)DEPLET? OR NONDEPLET?) AND ANTIBOD?
S2	90	RD S1 (unique items)
S3	32	S2 AND HUMAN?

? t s2/3/all

2/3/1 (Item 1 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13659285 BIOSIS Number: 99659285  
A role for Th2 cytokines in the suppression of **CD8+** T cell-mediated graft rejection  
Scully R; Cobbold S P; Mellor A L; Wissing M; Arnold B; Waldmann H  
Sir William Dunn Sch. Pathol., South Parks Road, Oxford OX1 3RE, UK  
European Journal of Immunology 27 (7). 1997. 1663-1670.  
Full Journal Title: European Journal of Immunology  
ISSN: 0014-2980  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 104 Iss. 005 Ref. 067684

2/3/2 (Item 2 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13658881 BIOSIS Number: 99658881  
A humanized form of a **CD4**-specific monoclonal **antibody** exhibits decreased antigenicity and prolonged plasma half-life in rhesus monkeys while retaining its unique biological and antiviral properties  
Reimann K A; Lin W; Bixler S; Browning B; Ehrenfels B N; Lucci J; Miatkowski K; Olson D; Parish T H; Rosa M D; Oleson F B; Hsu Y M; Padlan E A; Letvin N L; Burkly L C  
Division Viral Pathogenesis, Beth Israel Deaconess Med. Cent., RE-113, 330 Brookline Ave., Boston, MA 02215, USA  
AIDS Research and Human Retroviruses 13 (11). 1997. 933-943.  
Full Journal Title: AIDS Research and Human Retroviruses  
ISSN: 0889-2229  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 104 Iss. 005 Ref. 067280

2/3/3 (Item 3 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13644851 BIOSIS Number: 99644851  
Strain variation in susceptibility to monoclonal **antibody**-induced transplantation tolerance  
Davies J D; Cobbold S P; Waldmann H  
Dep. Immunol., IMM-23, Scripps Res. Inst., 10550 North Torey Pines Road, La Jolla, CA 92037, USA  
Transplantation (Baltimore) 63 (11). 1997. 1570-1573.  
Full Journal Title: Transplantation (Baltimore)  
ISSN: 0041-1337

2/3/4 (Item 4 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13627855 BIOSIS Number: 99627855  
The immunological and pharmacodynamic effects of a humanised **non-depleting** anti-**CD4** monoclonal **antibody** (mAb) in rheumatoid arthritis (RA)  
Choy E H S; Connolly D J A; Regan T; Manna V K; Rapson N; Kingsley G H; Panayi G S; Johnston J M  
Glaxo Wellcome, Beckenham, London, UK  
British Journal of Rheumatology 36 (SUPPL. 1). 1997. 185.  
Full Journal Title: XIVth Annual General Meeting of the British Society of Rheumatology, Harrogate, England, UK, April 23-25, 1997. British Journal of Rheumatology  
ISSN: 0263-7103  
Language: ENGLISH  
Document Type: CONFERENCE PAPER  
Print Number: Biological Abstracts/RRM Vol. 049 Iss. 008 Ref. 134420

2/3/5 (Item 5 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13627731 BIOSIS Number: 99627731  
The clinical effect of a by humanised **non-depleting** anti-**CD4** monoclonal **antibody** (mAb) in rheumatoid arthritis (RA)  
Panayi G S; Chov E H S; Connolly D J A; Manna V K; Regan T; Rapson N; Kingsley G H; Johnston J M  
Rheumatology Unit, Guy's Hosp., UMDS, London, UK  
British Journal of Rheumatology 36 (SUPPL. 1). 1997. 122.  
Full Journal Title: XIVth Annual General Meeting of the British Society of Rheumatology, Harrogate, England, UK, April 23-25, 1997. British Journal of Rheumatology  
ISSN: 0263-7103  
Language: ENGLISH  
Document Type: CONFERENCE PAPER  
Print Number: Biological Abstracts/RRM Vol. 049 Iss. 008 Ref. 134296

2/3/6 (Item 6 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13475763 BIOSIS Number: 99475763  
Protection from experimental autoimmune encephalomyelitis (EAE): **Non-depleting** anti-**CD4** mAb treatment induces peripheral T-cell tolerance to MBP in PL-J mice  
Biasi G; Facchinetti A; Monastera G; Mezzalana S; Sivieri S; Tavolato B; Gallo P  
Inst. Exp. Pathol., Univ. Ancona, Ancona, Italy  
Journal of Neuroimmunology 73 (1-2). 1997. 117-123.  
Full Journal Title: Journal of Neuroimmunology  
ISSN: 0165-5728  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 103 Iss. 009 Ref. 131432

2/3/7 (Item 7 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13436879 BIOSIS Number: 99436879

Efficacy of RIB 5-2, a novel **non-depleting** anti-**CD4** **antibody**, in prolonging intrapulmonary transgene expression of E1-deleted adenoviral vectors

Lei D; Nelson S; Summer W R; Shellito J E; Kolls J K

LSU, Sect. Pulmonary Critical Care Med., New Orleans, LA, USA

Journal of Investigative Medicine 45 (1). 1997. 59A.

Full Journal Title: American Federation for Medical Research Southern Regional Meeting, New Orleans, Louisiana, USA, February 5-7, 1997. Journal of Investigative Medicine

ISSN: 1081-5589

Language: ENGLISH

Document Type: CONFERENCE PAPER

Print Number: Biological Abstracts/RRM Vol. 049 Iss. 004 Ref. 057731

2/3/8 (Item 8 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13417803 BIOSIS Number: 99417803

Induction of donor specific transplantation tolerance to cardiac allografts following treatment with **nondepleting** (RIB 5-2) or depleting (OX-38) anti-**CD4** mAb plus intrathymic or intravenous donor alloantigen

Arima T; Lehmann M; Flye M W

One Barnes Hosp. Plaza, Suite 5103, St. Louis, MO 63110, USA

Transplantation (Baltimore) 63 (2). 1997. 284-292.

Full Journal Title: Transplantation (Baltimore)

ISSN: 0041-1337

Language: ENGLISH

Print Number: Biological Abstracts Vol. 103 Iss. 007 Ref. 089946

2/3/9 (Item 9 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13402315 BIOSIS Number: 99402315

T cell hypothesis in rheumatoid arthritis (RA) tested by humanised **non-depleting** anti-**CD4** monoclonal **antibody** (mAb)

treatment I: Suppression of disease activity and acute phase response

Panayi G S; Choy E H S; Connolly D J A; Manna V K; Regan T; Rapson N; Kingsley G H; Johnston J M

Rheumatology Unit, Guy's Hosp., UMDS, London, UK

Immunology 89 (SUPPL. 1). 1996. 92.

Full Journal Title: Joint Congress of the British Society for Immunology and the Biochemical Society, Harrogate, England, UK, December 10-13, 1996. Immunology

ISSN: 0019-2805

Language: ENGLISH

Document Type: CONFERENCE PAPER

Print Number: Biological Abstracts/RRM Vol. 049 Iss. 003 Ref. 048954

2/3/10 (Item 10 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13402314 BIOSIS Number: 99402314

T cell hypothesis in rheumatoid arthritis (RA) tested by humanised **non-depleting** anti-**CD4** monoclonal **antibody** (mAb)

treatment II: Clinical activity is related to pharmacodynamic effects

Choy E H S; Connolly D J A; Regan T; Manna V K; Rapson N; Kingsley G H;  
Panayi G S; Johnston J M  
Rheumatology Unit, Guy's Hosp., UMDS, London, UK  
Immunology 89 (SUPPL. 1). 1996. 92.  
Full Journal Title: Joint Congress of the British Society for Immunology  
and the Biochemical Society, Harrogate, England, UK, December 10-13, 1996.  
Immunology  
ISSN: 0019-2805  
Language: ENGLISH  
Document Type: CONFERENCE PAPER  
Print Number: Biological Abstracts/RRM Vol. 049 Iss. 003 Ref. 048953

2/3/11 (Item 11 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13319410 BIOSIS Number: 99319410  
Induction of "infectious " tolerance to MHC-incompatible cardiac  
allografts in sensitized rat recipients treated with a **nondepleting**  
**CD4 monoclonal antibody**  
Onodera K; Lehmann M; Volk H-D; Sayegh M H; Kupiec-Weglinski J W  
Surg. Res. Lab., Harv. Med. Sch., Dep. Surg. Med., Brigham and Women's  
Hosp., Boston, MA, USA  
Surgical Forum 47 (0). 1996. 423-427.  
Full Journal Title: Surgical Forum  
ISSN: 0071-8041  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 103 Iss. 002 Ref. 022524

2/3/12 (Item 12 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13224264 BIOSIS Number: 99224264  
T cell hypothesis in rheumatoid arthritis (RA) tested by humanized  
**non-depleting anti-CD4 monoclonal antibody (mAb)**  
treatment III: Immunological effects  
Connolly D J A; Choy E H S; Rapson N; Regan T; Kingsley G H; Johnston J M  
; Panayi G S  
Rheumatol. Unit, Guy's Hosp., UMDS, London, UK  
Arthritis & Rheumatism 39 (9 SUPPL.). 1996. S245.  
Full Journal Title: 60th National Scientific Meeting of the American  
College of Rheumatology and the 31st National Scientific Meeting of the  
Association of Rheumatology Health Professionals, Orlando, Florida, USA,  
October 18-22, 1996. Arthritis & Rheumatism  
ISSN: 0004-3591  
Language: ENGLISH  
Document Type: CONFERENCE PAPER  
Print Number: Biological Abstracts/RRM Vol. 048 Iss. 011 Ref. 203385

2/3/13 (Item 13 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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13224263 BIOSIS Number: 99224263  
T cell hypothesis in rheumatoid arthritis (RA) tested by humanized  
**non-depleting anti-CD4 monoclonal antibody (mAb)**  
treatment II: Clinical activity is related to pharmacodynamic effects  
Choy E H S; Connolly D J A; Regan T; Manna V K; Rapson N; Kingsley G H;  
Panayi G S; Johnston J M  
Rheumatol. Unit, Guy's Hosp., UMDS, London, UK  
Arthritis & Rheumatism 39 (9 SUPPL.). 1996. S244.



Full Journal Title: 60th National Scientific Meeting of the American College of Rheumatology and the 31st National Scientific Meeting of the Association of Rheumatology Health Professionals, Orlando, Florida, USA, October 18-22, 1996. Arthritis & Rheumatism

ISSN: 0004-3591

Language: ENGLISH

Document Type: CONFERENCE PAPER

Print Number: Biological Abstracts/RRM Vol. 048 Iss. 011 Ref. 203384

2/3/14 (Item 14 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13224262 BIOSIS Number: 99224262

T cell hypothesis in rheumatoid arthritis (RA) tested by humanized **non-depleting** anti-**CD4** monoclonal **antibody** (mAb)

treatment I: Suppression of disease activity and acute phase response

Panayi G S; Choy E H S; Connolly D J A; Regan T; Manna V K; Rapson N; Kingsley G H; Johnston J M

Rheumatol. Unit, Guy's Hosp., UMDS, London, UK

Arthritis & Rheumatism 39 (9 SUPPL.). 1996. S244.

Full Journal Title: 60th National Scientific Meeting of the American College of Rheumatology and the 31st National Scientific Meeting of the Association of Rheumatology Health Professionals, Orlando, Florida, USA, October 18-22, 1996. Arthritis & Rheumatism

ISSN: 0004-3591

Language: ENGLISH

Document Type: CONFERENCE PAPER

Print Number: Biological Abstracts/RRM Vol. 048 Iss. 011 Ref. 203383

2/3/15 (Item 15 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13223537 BIOSIS Number: 99223537

Results of a placebo-controlled multicenter trial using a primatized **non-depleting**, anti-**CD4** monoclonal **antibody** in the treatment of rheumatoid arthritis

Levy R; Weisman M; Wisenhutter C; Yocum D; Schnitzer T; Goldman A; Schiff M; Leiden B F; Solinger A; MacDonald B; Lipani J

Olympia, WA 98502, USA

Arthritis & Rheumatism 39 (9 SUPPL.). 1996. S122.

Full Journal Title: 60th National Scientific Meeting of the American College of Rheumatology and the 31st National Scientific Meeting of the Association of Rheumatology Health Professionals, Orlando, Florida, USA, October 18-22, 1996. Arthritis & Rheumatism

ISSN: 0004-3591

Language: ENGLISH

Document Type: CONFERENCE PAPER

Print Number: Biological Abstracts/RRM Vol. 048 Iss. 011 Ref. 202658

2/3/16 (Item 16 from file: 55)

DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

13104687 BIOSIS Number: 99104687

Influence of selective T-lymphocyte depletion on the lung pathology of gnotobiotic calves and the distribution of different T-lymphocyte subsets following challenge with bovine respiratory syncytial virus

Thomas L H; Cook R S; Howard C J; Gaddum R M; Taylor G

Inst. Anim. Health, Compton, Newbury RH20 7NN, UK

Research in Veterinary Science 61 (1). 1996. 38-44.

Full Journal Title: Research in Veterinary Science  
ISSN: 0034-5288  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 102 Iss. 005 Ref. 070136

2/3/17 (Item 17 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13098437 BIOSIS Number: 99098437  
**CD4+** T cell mediated destruction of xenografts within  
cell-impermeable membranes in the absence of **CD8+** T cells and B cells  
Loudovaris T; Mandel T E; Charlton B  
Baxter Healthcare Corporation, Gene Therapy Unit, Baxter Technol. Park  
WG2 2S, Round Lake, IL 60073-0490, USA  
Transplantation (Baltimore) 61 (12). 1996. 1678-1684.  
Full Journal Title: Transplantation (Baltimore)  
ISSN: 0041-1337  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 102 Iss. 005 Ref. 063886

2/3/18 (Item 18 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13088015 BIOSIS Number: 99088015  
Kinetics of induction of transplantation tolerance with a  
**nondepleting** anti-**Cd4** monoclonal **antibody** and  
donor-specific transfusion before transplantation  
Saitovitch D; Bushell A; Mabbs D W; Morris P J; Wood K J  
Nuffield Dep. Surg., Univ. Oxford, John Radcliffe Hosp., Headington,  
Oxford OX3 9DU, UK  
Transplantation (Baltimore) 61 (11). 1996. 1642-1647.  
Full Journal Title: Transplantation (Baltimore)  
ISSN: 0041-1337  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 102 Iss. 004 Ref. 053464

2/3/19 (Item 19 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13074445 BIOSIS Number: 99074445  
Prevention of collagen-induced arthritis by a **non-depleting**  
**anti-CD4 antibody**  
Chu C Q; Londei M  
Kennedy Inst. Rheumatology, London W6 7DW, UK  
British Journal of Rheumatology 35 (ABSTR. SUPPL. 1). 1996. 108.  
Full Journal Title: XIIIth Annual General Meeting British Society for  
Rheumatology, Brighton, England, UK, May 8-10, 1996. British Journal of  
Rheumatology  
ISSN: 0263-7103  
Language: ENGLISH  
Document Type: CONFERENCE PAPER  
Print Number: Biological Abstracts/RRM Vol. 048 Iss. 008 Ref. 139625

2/3/20 (Item 20 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

13031632 BIOSIS Number: 99031632

Immunological markers of response in a multi-dose protocol 7002 using an immunomodulating, **non-depleting** Primatized anti-**CD4** monoclonal **antibody** in rheumatoid arthritis (RA)

Solinger A; Paxton H; Wey K; Yocum D  
IDEC Pharmaceuticals, San Diego, CA 92121, USA  
FASEB Journal 10 (6). 1996. A1314.

Full Journal Title: Joint Meeting of the American Society for Biochemistry and Molecular Biology, the American Society for Investigative Pathology and the American Association of Immunologists, New Orleans, Louisiana, USA, June 2-6, 1996. FASEB Journal

ISSN: 0892-6638

Language: ENGLISH

Document Type: CONFERENCE PAPER

Print Number: Biological Abstracts/RRM Vol. 048 Iss. 007 Ref. 125368

2/3/21 (Item 21 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

12176618 BIOSIS Number: 98776618

The effects of **nondepleting CD4** targeted therapy in presensitized rat recipients of cardiac allografts

Binder J; Lehmann M; Graser E; Hancock W W; Watschinger B; Onodera K; Sayegh M H; Volk H-D; Kupiec-Weglinski J W

Surgical Res. Lab., Harvard Medical School, 260 Longwood Ave., Boston, MA 02115, USA

Transplantation (Baltimore) 61 (5). 1996. 804-811.

Full Journal Title: Transplantation (Baltimore)

ISSN: 0041-1337

Language: ENGLISH

Print Number: Biological Abstracts Vol. 101 Iss. 010 Ref. 143810

2/3/22 (Item 22 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

12165809 BIOSIS Number: 98765809

Immunological markers of response in a multi-dose protocol 7002 using an immunomodulating, **non-depleting** primatized-TM anti-**CD4** monoclonal **antibody** in rheumatoid arthritis (RA)

Solinger A; Paxton H; Wey K; Yocum D  
IDEC Pharmaceuticals, San Diego, CA 92121, USA  
FASEB Journal 10 (3). 1996. A442.

Full Journal Title: Experimental Biology 96, Part II, Washington, D.C., USA, April 14-17, 1996. FASEB Journal

ISSN: 0892-6638

Language: ENGLISH

Document Type: CONFERENCE PAPER

Print Number: Biological Abstracts/RRM Vol. 048 Iss. 005 Ref. 082598

2/3/23 (Item 23 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11935571 BIOSIS Number: 98535571

Modulation of mitogen and recall antigen proliferation by a **non-depleting**, anti-**CD4** monoclonal **antibody**: Results of a multi-dose study

Yocum D E; Mararescu M; Soundararajan D; Nordensson K; Solinger A M; Lipani J

Univ. Ariz., Tucson, AZ 85724, USA

Arthritis & Rheumatism 38 (9 SUPPL.). 1995. S280.

Full Journal Title: 59th National Scientific Meeting of the American College of Rheumatology and the 30th National Scientific Meeting of the Association of Rheumatology Health Professionals, San Francisco, California, USA, October 21-26, 1995. Arthritis & Rheumatism

ISSN: 0004-3591

Language: ENGLISH

Document Type: CONFERENCE PAPER

Print Number: Biological Abstracts/RRM Vol. 047 Iss. 012 Ref. 205446

2/3/24 (Item 24 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11935007 BIOSIS Number: 98535007

Treating rheumatoid arthritis with a **non-depleting anti-CD4 monoclonal antibody** (MAb)

Moreland L W; Bucy R P; Knowles R W; Wacholtz M C; Haverty T P; Koopman W J

Univ. Alabama at Birmingham, Birmingham, AL, USA  
Arthritis & Rheumatism 38 (9 SUPPL.). 1995. S186.

Full Journal Title: 59th National Scientific Meeting of the American College of Rheumatology and the 30th National Scientific Meeting of the Association of Rheumatology Health Professionals, San Francisco, California, USA, October 21-26, 1995. Arthritis & Rheumatism

ISSN: 0004-3591

Language: ENGLISH

Document Type: CONFERENCE PAPER

Print Number: Biological Abstracts/RRM Vol. 047 Iss. 012 Ref. 204882

2/3/25 (Item 25 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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11935003 BIOSIS Number: 98535003

Results of a multi-dose protocol 7002 using an immunomodulating, **non-depleting PRIMATIZED anti-CD4 monoclonal antibody** in rheumatoid arthritis (RA)

Kaine J; Solinger A; Yocum D; Lipani J; Klas P; Tesser J; Wiesenhuber C; O'Sullivan F; Shuman S; Rigby W

Sarasota Arthritis Center, Sarasota, FL 34239, USA  
Arthritis & Rheumatism 38 (9 SUPPL.). 1995. S185.

Full Journal Title: 59th National Scientific Meeting of the American College of Rheumatology and the 30th National Scientific Meeting of the Association of Rheumatology Health Professionals, San Francisco, California, USA, October 21-26, 1995. Arthritis & Rheumatism

ISSN: 0004-3591

Language: ENGLISH

Document Type: CONFERENCE PAPER

Print Number: Biological Abstracts/RRM Vol. 047 Iss. 012 Ref. 204878

2/3/26 (Item 26 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11922333 BIOSIS Number: 98522333

Administration of a **nondepleting Anti-CD4 monoclonal antibody** (W3-25) prevents adjuvant arthritis, even upon rechallenge: Parallel administration of a depleting anti-**CD8 monoclonal antibody** (OX8) does not modify the effect of W3-25

Pelegri C; Morante M P; Castellote C; Castell M; Franch A  
Unit Physiol., Fac. Pharm., Univ. Barcelona, Barcelona, Spain  
Cellular Immunology 165 (2). 1995. 177-182.

Full Journal Title: Cellular Immunology  
ISSN: 0008-8749  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 100 Iss. 011 Ref. 173190

2/3/27 (Item 27 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11922318 BIOSIS Number: 98522318  
Therapeutic monoclonal **antibodies**  
Choy E H S; Panayi G S; Kingsley G H  
Rheumatol. Unit, Div. Medicine, UMDS, 4th Floor, Hunt's House, Guy's  
Hospital, St. Thomas Street, London SE1 9RT, UK  
British Journal of Rheumatology 34 (8). 1995. 707-715.  
Full Journal Title: British Journal of Rheumatology  
ISSN: 0263-7103  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 100 Iss. 011 Ref. 173175

2/3/28 (Item 28 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11916953 BIOSIS Number: 98516953  
Transplantation tolerance induced by antigen pretreatment and depleting  
anti-**CD4 antibody** depends on **CD4+** T cell regulation  
during the induction phase of the response  
Bushell A; Morris P J; Wood K J  
Nuffield Dep. Surgery, Univ. Oxford, John Radcliffe Hospital, Headington,  
Oxford OX3 9DU, UK  
European Journal of Immunology 25 (9). 1995. 2642-2649.  
Full Journal Title: European Journal of Immunology  
ISSN: 0014-2980  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 100 Iss. 011 Ref. 167810

2/3/29 (Item 29 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11809407 BIOSIS Number: 98409407  
Early-appearing tumour-infiltrating natural killer cells play a crucial  
role in the generation of anti-tumor T lymphocytes  
Kurosawa S; Harada M; Matsuzaki G; Shinomiya Y; Terao H; Kobayashi N;  
Nomoto K  
Dep. Virology, Med. Inst. Bioregulation, Kyushu Univ., 3-1-1 Maidashi  
Higashi-ku, Fukuoka 812, Japan  
Immunology 85 (2). 1995. 338-346.  
Full Journal Title: Immunology  
ISSN: 0019-2805  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 100 Iss. 006 Ref. 086999

2/3/30 (Item 30 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11807249 BIOSIS Number: 98407249  
Regulation of nitric oxide release by macrophages after intratracheal  
lipopolysaccharide

Shellito J E; Kolls J K; Summer W R  
Sect. Pulmonary Critical Care Med., Louisiana State Univ. Med. Cent.,  
Suite 3205, 1901 Perdido St., New Orleans, LA 70112, USA  
American Journal of Respiratory Cell and Molecular Biology 13 (1). 1995.  
45-53.  
Full Journal Title: American Journal of Respiratory Cell and Molecular  
Biology  
ISSN: 1044-1549  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 100 Iss. 006 Ref. 084841

2/3/31 (Item 31 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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11760328 BIOSIS Number: 98360328  
Activation of **CD4+** T cells in the presence of a **nondepleting**  
monoclonal **antibody** to **CD4** induces a Th2-Type response in vitro  
Stumbles P; Mason D  
MRC Cellular Immunol. Unit, Sir William Dunn Sch. Pathol., University  
Oxford, South Parks Rd., Oxford OX1 3RE, UK  
Journal of Experimental Medicine 182 (1). 1995. 5-13.  
Full Journal Title: Journal of Experimental Medicine  
ISSN: 0022-1007  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 100 Iss. 004 Ref. 052166

2/3/32 (Item 32 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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11612318 BIOSIS Number: 98212318  
Induction of transplantation tolerance using a **nondepleting** anti-  
**CD4** MAb and donor-specific transfusion before transplantation:  
Evidence that a critical period of time is required for the development of  
immunological unresponsiveness  
Saitovitch D; Bushell A R; Morris P J; Wood K J  
Nuffield Dep. Surg., John Radcliffe Hosp., Headington, Oxford OX3 9DU, UK  
Transplantation Proceedings 27 (1). 1995. 117-118.  
Full Journal Title: XVth World Congress of the Transplantation Society,  
Kyoto, Japan, August 28-September 2, 1994. Transplantation Proceedings  
ISSN: 0041-1345  
Language: ENGLISH  
Document Type: CONFERENCE PAPER  
Print Number: Biological Abstracts/RRM Vol. 047 Iss. 005 Ref. 085981

2/3/33 (Item 33 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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11612317 BIOSIS Number: 98212317  
Donor-specific transplantation unresponsiveness in sensitized rats  
following treatment with a **nondepleting** anti-**CD4** MAb is  
associated with selective intragraft sparing of TH2-like cells  
Binder J; Hancock W W; Wasowska B; Gallon L; Watschinger B; Sayegh M H;  
Brock J; Lehmann M; Volk H D; Kupiec-Weglinski J W  
Surg. Res. Lab., Harv. Med. Sch., 260 Longwood Ave., Boston, MA 02115,  
USA  
Transplantation Proceedings 27 (1). 1995. 114-116.  
Full Journal Title: XVth World Congress of the Transplantation Society,  
Kyoto, Japan, August 28-September 2, 1994. Transplantation Proceedings  
ISSN: 0041-1345

2/3/34 (Item 34 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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11435757 BIOSIS Number: 98035757  
Donor-specific transplantation unresponsiveness in sensitized rats  
following treatment with a **nondepleting** anti-**CD4** monoclonal  
**antibody**  
Binder J; Sayegh M H; Watschinger B; Hancock W W; Lehmann M; Volk H D;  
Kupiec-Weglinski J W  
Surg. Res. Lab., Harv. Med. Sch., Dep. Surg. Med., Brigham and Women's  
Hosp., Boston, MA, USA  
Surgical Forum 45 (0). 1994. 438-442.  
Full Journal Title: Surgical Forum  
ISSN: 0071-8041  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 099 Iss. 002 Ref. 020301

2/3/35 (Item 35 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11345675 BIOSIS Number: 97545675  
Mechanisms in **CD4 antibody**-mediated transplantation  
tolerance: Kinetics of induction, antigen dependency and role of regulatory  
T cells  
Scully R; Qin S; Cobbold S; Waldmann H  
Sir William Dunn Sch. Pathol., South Parks Road, Oxford OX1 3RE, UK  
European Journal of Immunology 24 (10). 1994. 2383-2392.  
Full Journal Title: European Journal of Immunology  
ISSN: 0014-2980  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 098 Iss. 012 Ref. 163298

2/3/36 (Item 36 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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11345669 BIOSIS Number: 97545669  
Immunological approach to inhibit formation of anti-**antibodies** to  
allo- and xenogeneic anti-T cell immunoglobulin  
Mysliwicz J; Thierfelder S; Mocikat R; Kremmer E  
GSF, Inst. Immunol., Marchioninstr. 25, D-81377 Muenchen, GER  
European Journal of Immunology 24 (10). 1994. 2323-2328.  
Full Journal Title: European Journal of Immunology  
ISSN: 0014-2980  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 098 Iss. 012 Ref. 163292

2/3/37 (Item 37 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11220223 BIOSIS Number: 97420223  
Sparing of the ipsilateral retina after anterior chamber inoculation of  
HSV-1: Requirement for either **CD4+** or **CD8+** T cells  
Azumi A; Atherton S S

Dep. Cellular and Structural Biol., Univ. Tex. Health Sci. Cent. San Antonio, 7703 Floyd Curl Drive, San Antonio, TX 78284-7762, USA  
Investigative Ophthalmology & Visual Science 35 (8). 1994. 3251-3259.  
Full Journal Title: Investigative Ophthalmology & Visual Science  
ISSN: 0146-0404  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 098 Iss. 007 Ref. 091035

2/3/38 (Item 38 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11130425 BIOSIS Number: 97330425  
The role of **CD4+** and **CD8+** cell subsets in the growth-control of MCH-13 fibrosarcoma  
Lucin K; Culo F; Jonjic N  
Dep. Pathol., Pathol. Anatomy, Med. Fac., University Rijeka, Olge Ban 22, 51000 Rijeka, CRO  
Periodicum Biologorum 95 (4). 1993. 395-400.  
Full Journal Title: Periodicum Biologorum  
ISSN: 0031-5362  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 098 Iss. 003 Ref. 036937

2/3/39 (Item 39 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11122665 BIOSIS Number: 97322665  
**Nondepleting anti-CD4 antibodies** in transplantation:  
Evidence that modulation is far less effective than prolonged **CD4** blockade  
Darby C R; Bushell A; Morris P J; Wood K J  
Nuffield Dep. Surg., Univ. Oxford, John Radcliffe Hosp., Oxford OX3 9DU, UK  
Transplantation (Baltimore) 57 (10). 1994. 1419-1426.  
Full Journal Title: Transplantation (Baltimore)  
ISSN: 0041-1337  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 098 Iss. 003 Ref. 029177

2/3/40 (Item 40 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

11114409 BIOSIS Number: 97314409  
Production of erythrocyte autoantibodies in NZB mice is inhibited by **CD4 antibodies**  
Oliveira G G S; Hutchings P R; Roitt I M; Lydyard P M  
Dep. Immunol., Univ. Coll. London Med. Sch., Arthur Stanley House, 40-50 Tottenham St., London W1P 9PG, UK  
Clinical and Experimental Immunology 96 (2). 1994. 297-302.  
Full Journal Title: Clinical and Experimental Immunology  
ISSN: 0009-9104  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 098 Iss. 002 Ref. 020921

2/3/41 (Item 41 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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10974934 BIOSIS Number: 97174934  
Modulation of murine herpes simplex virus type 1 retinitis in the  
uninoculated eye by **CD4+** T lymphocytes  
Azumi A; Cousins S W; Kanter M Y; Atherton S S  
Dep. Cell. Structural Biol., Univ. Texas Health Sci. Cent. San Antonio,  
7703 Floyd Curl Dr., San Antonio, TX 78284-7762, USA  
Investigative Ophthalmology & Visual Science 35 (1). 1994. 54-63.  
Full Journal Title: Investigative Ophthalmology & Visual Science  
ISSN: 0146-0404  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 097 Iss. 008 Ref. 108605

2/3/42 (Item 42 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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10973679 BIOSIS Number: 97173679  
A **nondepleting** anti-rat **CD4** monoclonal **antibody** that  
suppresses T helper 1-like but not T helper 2-like intragraft lymphokine  
secretion induces long-term survival of renal allografts  
Siegling A; Lehmann M; Riedel H; Platzer C; Brock J; Emmrich F; Volk H-D  
Inst. Med. Immunologie, Med. Fakultat, Schummanstr. 20/21, D-O-1040  
Berlin, GER  
Transplantation (Baltimore) 57 (3). 1994. 464-467.  
Full Journal Title: Transplantation (Baltimore)  
ISSN: 0041-1337  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 097 Iss. 008 Ref. 107344

2/3/43 (Item 43 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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10845914 BIOSIS Number: 97045914  
Comparison of **CD4** depleting and **nondepleting** monoclonal  
**antibodies** in the mouse heart allograft model  
Han W R; Mottram P L; McKenzie I F C  
Dep. Surgery, Royal Melbourne Hosp., Parville 3050, AUL  
Transplantation Proceedings 25 (5). 1993. 2933-2934.  
Full Journal Title: Transplantation Proceedings  
ISSN: 0041-1345  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 097 Iss. 003 Ref. 029799

2/3/44 (Item 44 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

10832905 BIOSIS Number: 97032905  
Tolerance to IDDM induced by **CD4 antibodies** in nonobese  
diabetic mice is reversed by cyclophosphamide  
Parish N M; Hutchings P R; Waldmann H; Cooke A  
Div. Immunol., Dep. Pathol., Univ. Cambridge, Tennis Court Rd., Cambridge  
CB2 1QP, UK  
Diabetes 42 (11). 1993. 1601-1605.  
Full Journal Title: Diabetes  
ISSN: 0012-1797  
Language: ENGLISH

2/3/45 (Item 45 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)

(c) 1997 BIOSIS. All rts. reserv.

10805769 BIOSIS Number: 97005769

T-cell recognition of a cross-reactive antigen(s) in erythrocytic stages of Plasmodium falciparum and Plasmodium yoelii: Inhibition of parasitemia by this antigen(s)

Lucas B; Engels A; Camus D; Haque A  
Centre Immunol., Biol. Parasitaire, Inst. Pasteur, 59019 Lille, FRA  
Infection and Immunity 61 (11). 1993. 4863-4869.  
Full Journal Title: Infection and Immunity  
ISSN: 0019-9567  
Language: ENGLISH  
Print Number: Biological Abstracts Vol. 097 Iss. 001 Ref. 005267

2/3/46 (Item 46 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

10479491 BIOSIS Number: 96079491

CONTROL OF IMMUNE-MEDIATED DISEASE OF THE CENTRAL NERVOUS SYSTEM WITH MONOCLONAL **CD4**-SPECIFIC **ANTIBODIES**

O'NEILL J K; BAKER D; DAVISON A N; ALLEN S J; BUTTER C; WALDMANN H; TURK J L  
DEP. PATHOLOGY, ROYAL COLL. SURGEONS ENGLAND, 35-43 LINCOLN'S INN FIELDS, LONDON WC2A 3PN, UK.  
J NEUROIMMUNOL 45 (1-2). 1993. 1-14. CODEN: JNRID  
Full Journal Title: Journal of Neuroimmunology  
Language: ENGLISH

2/3/47 (Item 47 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

10131551 BIOSIS Number: 95131551

ACTIVE SUPPRESSION INDUCED BY ANTI-**CD4**

HUTCHINGS P R; COOKE A; DAWE K; WALDMANN H; ROITT I M  
PATHOL. DEP., UNIV. CAMBRIDGE, TENNIS COURT ROAD, CAMBRIDGE CB2 1QP, UK.  
EUR J IMMUNOL 23 (4). 1993. 965-968. CODEN: EJIMA  
Full Journal Title: European Journal of Immunology  
Language: ENGLISH

2/3/48 (Item 48 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

10017021 BIOSIS Number: 95017021

DEVELOPMENT OF MURINE LUPUS IN **CD4**-DEPLETED NZB-NZW MICE SUSTAINED INHIBITION OF RESIDUAL **CD4**-POSITIVE T CELLS IS REQUIRED TO SUPPRESS AUTOIMMUNITY

CONNOLLY K; ROUBINIAN J R; WOFSY D  
ARTHRITIS/IMMUNOL. SECTION, VETRANS ADM. MED. CENT., 4150 CLEMENT STREET, SAN FRANCISCO, CALIF. 94121.  
J IMMUNOL 149 (9). 1992. 3083-3088. CODEN: JOIMA  
Full Journal Title: Journal of Immunology  
Language: ENGLISH

2/3/49 (Item 49 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

9629018 BIOSIS Number: 94134018

DOWN REGULATION OF STEM CELL COLONY FORMATION BY PURIFIED **CD8**  
LYMPHOCYTES AND **CD8** CONDITIONED MEDIUM POTENTIAL IMPORTANCE FOR BONE  
MARROW TRANSPLANTATION IN LEUKEMIA

GAZITT Y; HE Y-J

PEDIATR. HEMATOL./ONCOL., BOX 100296 JHMH, GAINESVILLE, FLA. 32610-0296,  
USA.

LEUK LYMPHOMA 8 (1-2). 1992. 117-127. CODEN: LELYE

Language: ENGLISH

2/3/50 (Item 50 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

9627323 BIOSIS Number: 94132323

EVIDENCE THAT LONG-TERM CARDIAC ALLOGRAFT SURVIVAL INDUCED BY ANTI-  
**CD4** MONOCLONAL **ANTIBODY** DOES NOT REQUIRE DEPLETION OF **CD4**  
-POSITIVE T CELLS

DARBY C R; MORRIS P J; WOOD K J

NUFFIELD DEP. SURGERY, JOHN RADCLIFFE HOSPITAL, HEADINGTON, OXFORD OX3  
9DU, U.K.

TRANSPLANTATION (BALTIMORE) 54 (3). 1992. 483-490. CODEN: TRPLA

Full Journal Title: TRANSPLANTATION (Baltimore)

Language: ENGLISH

2/3/51 (Item 51 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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9568863 BIOSIS Number: 94073863

THE USE OF A **NON-DEPLETING** ANTI-**CD4** MONOCLONAL  
**ANTIBODY** TO RE-ESTABLISH TOLERANCE TO BETA CELLS IN NOD MICE

HUTCHINGS P; O'REILLY L; PARISH N M; WALDMANN H; COOKE A

DEP. PATHOL., UNIV. CAMBRIDGE, TENNIS COURT RD., CAMBRIDGE CB2 1QP, GB.

EUR J IMMUNOL 22 (7). 1992. 1913-1918. CODEN: EJIMA

Full Journal Title: European Journal of Immunology

Language: ENGLISH

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DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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9115339 BIOSIS Number: 93100339

COMPARISON OF GK1.5 AND CHIMERIC RAT-MOUSE GK1.5 ANTI-**CD4**  
**ANTIBODIES** FOR PROLONGATION OF SKIN ALLOGRAFT SURVIVAL AND  
SUPPRESSION OF ALLOANTIBODY PRODUCTION IN MICE

RASHID A; AUCHINCLOSS H JR; SHARON J

BOSTON UNIV. SCH. MED., 80 EAST CONCORD STREET, K707, BOSTON, MASS.  
02118.

J IMMUNOL 148 (5). 1992. 1382-1388. CODEN: JOIMA

Full Journal Title: Journal of Immunology

Language: ENGLISH

2/3/53 (Item 53 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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9032472 BIOSIS Number: 93017472

ANTI-**CD2** **ANTIBODIES** INDUCE T CELL UNRESPONSIVENESS IN-VIVO

GUECKEL B; BEREK C; LUTZ M; ALTEVOGT P; SCHIRRMACHER V; KYEWSKI B A

INST. IMMUNOL. AND GENETICS, GERMAN CANCER RES. CENT., IM NEUENHEIMER  
FELD 280, D-6900 HEIDELBERG, GER.

J EXP MED 174 (5). 1991. 957-968. CODEN: JEMEA  
Full Journal Title: Journal of Experimental Medicine  
Language: ENGLISH

2/3/54 (Item 54 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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9020424 BIOSIS Number: 93005424  
SUPPRESSION IN MURINE EXPERIMENTAL AUTOIMMUNE THYROIDITIS IN-VIVO  
INHIBITION OF CD4-POSITIVE T CELL-MEDIATED RESISTANCE BY A  
**NONDEPLETING RAT CD4 MONOCLONAL ANTIBODY**  
NABOZNY G H; COBBOLD S P; WALDMANN H; KONG Y-C M  
DEP. IMMUNOL. MICROBIOL, WAYNE STATE UNIV. SCH. MED., DETROIT, MICH.  
CELL IMMUNOL 138 (1). 1991. 185-196. CODEN: CLIMB  
Full Journal Title: Cellular Immunology  
Language: ENGLISH

2/3/55 (Item 55 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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8167526 BIOSIS Number: 91088526  
THE INDUCTION OF SKIN GRAFT TOLERANCE IN MAJOR HISTOCOMPATIBILITY  
COMPLEX-MISMATCHED OR PRIMED RECIPIENTS PRIMED T CELLS CAN BE TOLERIZED IN  
THE PERIPHERY WITH ANTI-CD4 AND ANTI-CD8 **ANTIBODIES**  
COBBOLD S P; MARTIN G; WALDMANN H  
DIV. IMMUNOL., CAMBRIDGE UNIV., DEP. PATHOL., LEVEL 3 LAB. BLOCK, NEW  
ADDENBROOKES HOSP., CAMBRIDGE CB2 2QQ, GREAT BRITIAN.  
EUR J IMMUNOL 20 (12). 1990. 2747-2756. CODEN: EJIMA  
Full Journal Title: European Journal of Immunology  
Language: ENGLISH

2/3/56 (Item 56 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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8095291 BIOSIS Number: 91016291  
RESISTANCE TO INFECTION BY HIV-1 OF PERIPHERAL BLOOD MONONUCLEAR CELLS  
FROM HIV-1-INFECTED PATIENTS IS PROBABLY MEDIATED BY NEUTRALIZING  
**ANTIBODIES**  
TREMBLAY M; NUMAZAKI K; LI X; GORNITSKY M; HISCOTT J; WAINBERG M A  
MCGILL AIDS CENTRE JEWISH GENERAL HOSP., 3755 COTE STE-CATHERINE ROAD,  
MONTREAL, QUEBEC H3T 1E2, CAN.  
J IMMUNOL 145 (9). 1990. 2896-2901. CODEN: JOIMA  
Full Journal Title: Journal of Immunology  
Language: ENGLISH

2/3/57 (Item 57 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

7529494 BIOSIS Number: 39042101  
A **NONDEPLETING RAT CD4 MONOCLONAL ANTIBODY** MAB INHIBITS  
CD4-POSITIVE SUPPRESSOR-MEDIATED RESISTANCE TO MURINE EXPERIMENTAL  
AUTO-IMMUNE THYROIDITIS IN-VIVO  
NABOZNY G H; COBBOLD S; WALDMANN H; KONG Y M  
WAYNE STATE UNIV. SCH. MED., DETROIT, MICH. 48201.  
JOINT MEETING OF THE AMERICAN SOCIETY FOR BIOCHEMISTRY AND MOLECULAR  
BIOLOGY, AND THE AMERICAN ASSOCIATION OF IMMUNOLOGISTS, NEW ORLEANS,  
LOUISIANA, USA, JUNE 4-7, 1990. FASEB (FED AM SOC EXP BIOL) J 4 (7). 1990.

A2099. CODEN: FAJOE  
Language: ENGLISH  
Document Type: CONFERENCE PAPER

2/3/58 (Item 58 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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7185784 BIOSIS Number: 88108529  
ENGAGEMENT OF CD-4 AND CD-8 ACCESSORY MOLECULES IS REQUIRED FOR T CELL  
MATURATION  
RAMSDELL F; FOWLKES B J  
LAB. CELLULAR MOLECULAR IMMUNOL., NIAID, NIH, BUILDING 4, ROOM 111,  
BETHESDA, MD 20892.  
J IMMUNOL 143 (5). 1989. 1467-1471. CODEN: JOIMA  
Full Journal Title: Journal of Immunology  
Language: ENGLISH

2/3/59 (Item 59 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

7104252 BIOSIS Number: 88026997  
AN INCREASE IN THE SURVIVAL OF MURINE H-2-MISMATCHED CULTURED FETAL  
PANCREAS ALLOGRAFTS USING DEPLETING OR **NONDEPLETING** ANTI-**CD4**  
MONOCLONAL **ANTIBODIES** AND A FURTHER INCREASE WITH THE ADDITION OF  
CYCLOSPORINE  
BURKHARDT K; CHARLTON B; MANDEL T E  
TRANSPLANTATION UNIT, WALTER AND ELIZA HALL INST. MED. RES., POST OFFICE,  
ROYAL MELBOURNE HOSP., VICTORIA 3050, AUST.  
TRANSPLANTATION (BALTIMORE) 47 (5). 1989. 771-775. CODEN: TRPLA  
Full Journal Title: TRANSPLANTATION (Baltimore)  
Language: ENGLISH

2/3/60 (Item 60 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

7083977 BIOSIS Number: 88006722  
ENDOGENOUSLY GENERATED ACTIVATED KILLER CELLS CIRCULATE AFTER AUTOLOGOUS  
AND ALLOGENEIC MARROW TRANSPLANTATION BUT NOT AFTER CHEMOTHERAPY  
REITTIE J E; GOTTLIEB D; HESLOP H E; LEGER O; DEXLER H G; HAZLEHURST G;  
HOFFBRAND A V; PRENTICE H G; BRENNER M K  
DEP. HAEMATOL., ROYAL FREE HOSP., POND ST., LONDON, NW3, UK.  
BLOOD 73 (5). 1989. 1351-1358. CODEN: BLOOA  
Full Journal Title: Blood  
Language: ENGLISH

2/3/61 (Item 61 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
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7010730 BIOSIS Number: 87071251  
ADOPTIVE IMMUNITY IN IMMUNE-DEFICIENT SCID-SCID MICE I. DIFFERENTIAL  
REQUIREMENTS OF NAIVE AND PRIMED LYMPHOCYTES FOR **CD4**-POSITIVE T CELLS  
DURING REJECTION OF MINOR HISTOCOMPATIBILITY ANTIGEN-DISPARATE SKIN GRAFTS  
ROOPENIAN D C; ANDERSON P S  
JACKSON LAB., BAR HARBOR, ME 04609.  
TRANSPLANTATION (BALTIMORE) 46 (6). 1988. 899-904. CODEN: TRPLA  
Full Journal Title: TRANSPLANTATION (Baltimore)  
Language: ENGLISH

2/3/62 (Item 62 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

7010433 BIOSIS Number: 87070954  
T-CELL-MEDIATED PROTECTION OF MICE AGAINST VIRULENT  
MYCOBACTERIUM-TUBERCULOSIS  
LEVETON C; BARNASS S; CHAMPION B; LUCAS S; DE SOUZA B; NICOL M; BANERJEE  
D; ROOK G  
DEP. MED. MICROBIOL., UNIV. COLL., LONDON W1P 7PP, U.K.  
INFECT IMMUN 57 (2). 1989. 390-395. CODEN: INFIB  
Full Journal Title: Infection and Immunity  
Language: ENGLISH

2/3/63 (Item 63 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

6649128 BIOSIS Number: 86115679  
HIGH INCIDENCE OF EARLY LEUKEMIC RELAPSE IN PATIENTS GIVEN CYCLOSPORIN  
AND T CELL DEPLETED HLA-IDENTICAL SIBLING MARROW TRANSPLANTS FOR ACUTE  
LEUKEMIA IN FIRST REMISSION  
ATKINSON K; BIGGS J; DODDS A; CONCANNON A; DOWNS K; ASHBY M; MCKENZIE I F  
C  
DEP. HAEMATOL., ST. VINCENT'S HOSP., DARLINGHURST, NSW 2010, AUSTRALIA.  
AUST N Z J MED 18 (4). 1988. 587-593. CODEN: ANZJB  
Full Journal Title: Australian and New Zealand Journal of Medicine  
Language: ENGLISH

2/3/64 (Item 64 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

5934551 BIOSIS Number: 84067116  
CD4 POSITIVE T CELLS APPEAR CAPABLE OF INITIATING GRAFT-VERSUS-HOST  
DISEASE ACROSS NON-MAJOR HISTOCOMPATIBILITY COMPLEX MHC BARRIERS IN MAN  
ATKINSON K; COOLEY M; FARRELLY H; O'FLAHERTY E; ASHBY M; BIGGS J  
DEP. HAEMATOL., ST VINCENT'S HOSP., DARLINGHURST, NSW 2010, AUSTRALIA.  
BONE MARROW TRANSPLANT 2 (1). 1987. 79-84. CODEN: BMTRE  
Full Journal Title: Bone Marrow Transplantation  
Language: ENGLISH

2/3/65 (Item 65 from file: 55)  
DIALOG(R)File 55:BIOSIS PREVIEWS(R)  
(c) 1997 BIOSIS. All rts. reserv.

5856041 BIOSIS Number: 83118348  
A COMPARATIVE STUDY OF T-CELL DEPLETED AND **NON-DEPLETED**  
MARROW TRANSPLANTATION FOR HEMATOLOGICAL MALIGNANCY  
ATKINSON K; ASHBY M; BIGGS J; CONCANNON A; COOLEY M; DODDS A; FARRELLY H;  
MORGAN G; O'FLAHERTY E; ET AL  
BONE MARROW TRANSPLANT. UNIT, ST. VICENT'S HOSP., DARLINGHURST, NSW 2010.  
AUST N Z J MED 17 (1). 1987. 16-23. CODEN: ANZJB  
Full Journal Title: Australian and New Zealand Journal of Medicine  
Language: ENGLISH

2/3/66 (Item 1 from file: 72)  
DIALOG(R)File 72:EMBASE  
(c) 1997 Elsevier Science B.V. All rts. reserv.

10211048 EMBASE No: 97016020

**Nondepleting anti-CD4 antibody** treatment prolongs  
lung-directed El-deleted adenovirus-mediated gene expression in rats  
Lei D.; Lehmann M.; Shellito J.E.; Nelson S.; Siegling A.; Volk H.-D.;  
Kolls J.K.

USA

Human Gene Therapy (USA) , 1996, 7/18 (2273-2279) CODEN: HGTHE ISSN:  
1043-0342

DOCUMENT TYPE: Journal

LANGUAGES: English SUMMARY LANGUAGES: English

NUMBER OF REFERENCES: 40

2/3/67 (Item 2 from file: 72)

DIALOG(R)File 72:EMBASE

(c) 1997 Elsevier Science B.V. All rts. reserv.

10014576 EMBASE No: 96188262

Kinetics of induction of transplantation tolerance with a  
**nondepleting anti-Cd4 monoclonal antibody** and  
donor-specific transfusion before transplantation: A critical period of  
time is required for development of immunological unresponsiveness

Saitovitch D.; Bushell A.; Mabbs D.W.; Morris P.J.; Wood K.J.

Nuffield Department of Surgery, University of Oxford, John Radcliffe  
Hospital, Headington, Oxford OX3 9DU United Kingdom

Transplantation (USA) , 1996, 61/11 (1642-1647) CODEN: TRPLA ISSN:  
0041-1337

LANGUAGES: English SUMMARY LANGUAGES: English

2/3/68 (Item 3 from file: 72)

DIALOG(R)File 72:EMBASE

(c) 1997 Elsevier Science B.V. All rts. reserv.

9976377 EMBASE No: 96158019

Assessment of chronic rejection in permanent accepted renal allografts in  
anti-**CD4** treated rats

Risch K.; Heemann U.; Graser E.; Nebe B.; Nizze H.; Lacha J.; Brock J.;  
Volk H.-D.; Lehmann M.

Institut fur medizinische Biochemie, Schillingallee 70, D-18057 Rostock  
Germany

Clinical Nephrology (Germany) , 1996, 45/5 (358-360) CODEN: CLNHB  
ISSN: 0301-0430

LANGUAGES: English SUMMARY LANGUAGES: English

2/3/69 (Item 4 from file: 72)

DIALOG(R)File 72:EMBASE

(c) 1997 Elsevier Science B.V. All rts. reserv.

9787616 EMBASE No: 95351540

T-cell regulation

Choy E.H.S.; Kingsley G.H.; Panayi G.S.

UMDS, Rheumatology Unit, Guy's Hospital, St Thomas Street, London SE1 9RT  
United Kingdom

Bailliere's Clinical Rheumatology (United Kingdom) , 1995, 9/4 (653-671)  
CODEN: BCRHE ISSN: 0950-3579

LANGUAGES: English SUMMARY LANGUAGES: English

2/3/70 (Item 5 from file: 72)

DIALOG(R)File 72:EMBASE

(c) 1997 Elsevier Science B.V. All rts. reserv.

9532547 EMBASE No: 95106020

Anti-**CD4** monoclonal **antibody** immune intervention in patients  
with newly diagnosed Type I (insulin-dependent) diabetes mellitus  
Hehmke B.; Kuttler B.; Laube F.; Gens E.; Michaelis D.; Hahn H.-J.;  
Schulze-Koops H.; Emmrich F.

Institute Diabetes 'Gerhardt Katsch', Dept Experimental Clin  
Endocrinology, D-17495 Karlsburg Germany

Diabetes, Nutrition and Metabolism - Clinical and Experimental (Italy) ,  
1994, 7/5 (273-280) CODEN: DNMEE ISSN: 0394-3402

LANGUAGES: English SUMMARY LANGUAGES: English

2/3/71 (Item 6 from file: 72)

DIALOG(R)File 72:EMBASE

(c) 1997 Elsevier Science B.V. All rts. reserv.

9312537 EMBASE No: 94265851

Expression of type 3 complement receptor on activated **CD8+** T cells  
facilitates homing to inflammatory sites

Nielsen H.V.; Christensen J.P.; Andersson E.C.; Marker O.; Thomsen A.R.

Medical Microbiol./Immunology Inst., Panum Institute, University of  
Copenhagen, 3c Blegdamsvej, DK-2200 N Copenhagen Denmark

J. IMMUNOL. (USA) , 1994, 153/5 (2021-2028) CODEN: JOIMA ISSN:  
0022-1767

LANGUAGES: English SUMMARY LANGUAGES: English

2/3/72 (Item 7 from file: 72)

DIALOG(R)File 72:EMBASE

(c) 1997 Elsevier Science B.V. All rts. reserv.

8677807 EMBASE No: 92358337

Pulmonary histopathology induced by respiratory syncytial virus (RSV)  
challenge of formalin-inactivated RSV-immunized BALB/c mice is abrogated by  
depletion of **CD4+** T cells

Connors M.; Kulkarni A.B.; Firestone C.-Y.; Holmes K.L.; Morse H.C. III;  
Sotnikov A.V.; Murphy B.R.

Respiratory Viruses Section, Laboratory of Infectious Diseases, NIAID,  
9000 Rockville Pike, Bethesda, MD 20892 USA

J. VIROL. (USA) , 1992, 66/12 (7444-7451) CODEN: JOVIA ISSN: 0022-538X

LANGUAGES: English SUMMARY LANGUAGES: English

2/3/73 (Item 8 from file: 72)

DIALOG(R)File 72:EMBASE

(c) 1997 Elsevier Science B.V. All rts. reserv.

8675097 EMBASE No: 92355607

Anti-**CD4** monoclonal **antibodies** in therapy: Creation of  
nonclassical tolerance in the adult

Shizuru J.A.; Alters S.E.; Fathman C.G.

Stanford Univ. School of Medicine, Div. of Rheumatology and Immunology,  
Stanford, CA 94305 USA

IMMUNOL. REV. (Denmark) , 1992, -/129 (105-130) CODEN: IMRED ISSN:  
0105-2896 ADONIS ORDER NUMBER: 010528969200046X

LANGUAGES: English SUMMARY LANGUAGES: English

2/3/74 (Item 9 from file: 72)

DIALOG(R)File 72:EMBASE

(c) 1997 Elsevier Science B.V. All rts. reserv.

8183556 EMBASE No: 91209639

Monoclonal **antibody** therapy for the induction of transplantation  
tolerance



Cobbold S.P.  
Division of Immunology, Cambridge University Department of Pathology,  
Tennis Court Road, Cambridge CB1 2QP United Kingdom  
IMMUNOL. LETT. (Netherlands) , 1991, 29/1-2 (117-122) CODEN: IMLED  
ISSN: 0165-2478 ADONIS ORDER NUMBER: 016524789100175N  
LANGUAGES: English

2/3/75 (Item 10 from file: 72)  
DIALOG(R)File 72:EMBASE  
(c) 1997 Elsevier Science B.V. All rts. reserv.

8013038 EMBASE No: 91038466  
Induction of tolerance in peripheral T cells with monoclonal  
**antibodies**  
Qin S.; Wise M.; Cobbold S.P.; Leong L.; Kong Y.-C.M.; Parnes J.R.;  
Waldmann H.  
Division of Immunology, Department of Pathology, Cambridge University,  
Cambridge CB2 2QQ United Kingdom  
EUR. J. IMMUNOL. (Germany, Federal Republic of) , 1990, 20/12 (2737-2745)  
CODEN: EJIMA ISSN: 0014-2980  
LANGUAGES: English

2/3/76 (Item 1 from file: 154)  
DIALOG(R)File 154:MEDLINE(R)  
(c) format only 1997 Knight-Ridder Info. All rts. reserv.

08981482 97119022  
In vivo depletion of NKR-P1 positive cells in the recipient prior to  
small bowel transplantation enhances graft-versus-host disease (GvHD) in  
the rat.  
Fandrich F; Exner B; Papachrysanthou A; Zhu X; Jahnke T; Chambers WH;  
Zavazava N  
Department of General and Thoracic Surgery, University of Kiel, Germany.  
Transpl Int (GERMANY) 1996, 9 Suppl 1 pS275-80, ISSN 0934-0874  
Journal Code: ADY  
Languages: ENGLISH  
Document type: JOURNAL ARTICLE

2/3/77 (Item 2 from file: 154)  
DIALOG(R)File 154:MEDLINE(R)  
(c) format only 1997 Knight-Ridder Info. All rts. reserv.

08976415 97180874  
Type 2 helper T cell-type cytokines and the development of "infectious"  
tolerance in rat cardiac allograft recipients.  
Onodera K; Hancock WW; Graser E; Lehmann M; Sayegh MH; Strom TB; Volk HD;  
Kupiec-Weglinski JW  
Harvard Medical School, Department of Surgery, Brigham and Women's  
Hospital, Boston, MA 02115, USA.  
J Immunol (UNITED STATES) Feb 15 1997, 158 (4) p1572-81, ISSN  
0022-1767 Journal Code: IFB  
Contract/Grant No.: RO1AI23847, AI, NIAID; RO1AI33100, AI, NIAID  
Languages: ENGLISH  
Document type: JOURNAL ARTICLE

2/3/78 (Item 3 from file: 154)  
DIALOG(R)File 154:MEDLINE(R)  
(c) format only 1997 Knight-Ridder Info. All rts. reserv.

08841016 96399103  
Induction of Th2 cytokines and control of collagen-induced arthritis by

**nondepleting anti-CD4 Abs.**

Chu CQ; Londei M

Kennedy Institute of Rheumatology, London, United Kingdom.

J Immunol (UNITED STATES) Sep 15 1996, 157 (6) p2685-9, ISSN  
0022-1767 Journal Code: IFB

Languages: ENGLISH

Document type: JOURNAL ARTICLE

2/3/79 (Item 4 from file: 154)

DIALOG(R)File 154:MEDLINE(R)

(c) format only 1997 Knight-Ridder Info. All rts. reserv.

08793357 96354996

Induction of "infectious" tolerance to MHC-incompatible cardiac  
allografts in CD4 monoclonal **antibody**-treated sensitized rat  
recipients.

Onodera K; Lehmann M; Akalin E; Volk HD; Sayegh MH; Kupiec-Weglinski JW  
Harvard Medical School, Surgical Research Laboratory, Boston, MA 02115,  
USA.

J Immunol (UNITED STATES) Sep 1 1996, 157 (5) p1944-50, ISSN  
0022-1767 Journal Code: IFB

Contract/Grant No.: AI23847, AI, NIAID; AI33100, AI, NIAID

Languages: ENGLISH

Document type: JOURNAL ARTICLE

2/3/80 (Item 5 from file: 154)

DIALOG(R)File 154:MEDLINE(R)

(c) format only 1997 Knight-Ridder Info. All rts. reserv.

08778938 96396455

Flow-cytometric analysis of peripheral lymphocytes in the rat following  
penetrating keratoplasty and immunosuppressive treatment.

Klebe S; Coupland SE; Krause L; Hoffmann F

Eye Department, Universitätsklinikum Benjamin Franklin, Berlin, Germany.

Ger J Ophthalmol (GERMANY) May 1996, 5 (3) p137-45, ISSN 0941-2921  
Journal Code: BNO

Languages: ENGLISH

Document type: JOURNAL ARTICLE

2/3/81 (Item 6 from file: 154)

DIALOG(R)File 154:MEDLINE(R)

(c) format only 1997 Knight-Ridder Info. All rts. reserv.

08554040 96161423

Innovative treatment approaches for rheumatoid arthritis. T-cell  
regulation.

Choy EH; Kingsley GH; Panayi GS

UMDS, Rheumatology Unit, Guy's Hospital, London, UK.

Baillieres Clin Rheumatol (ENGLAND) Nov 1995, 9 (4) p653-71, ISSN  
0950-3579 Journal Code: CRY

Languages: ENGLISH

Document type: JOURNAL ARTICLE; REVIEW; REVIEW, TUTORIAL

2/3/82 (Item 7 from file: 154)

DIALOG(R)File 154:MEDLINE(R)

(c) format only 1997 Knight-Ridder Info. All rts. reserv.

08431029 96053387

In vivo cytotoxic T-lymphocyte induction may take place via CD8 T  
helper lymphocytes.

Lasarte JJ; Sarobe P; Prieto J; Borrás-Cuesta F

Universidad de Navarra, Facultad de Medicina, Departamento de Medicina  
Interna, Pamplona, Spain.

Res Immunol (FRANCE) Jan 1995, 146 (1) p35-44, ISSN 0923-2494  
Journal Code: R6E

Languages: ENGLISH

Document type: JOURNAL ARTICLE

2/3/83 (Item 8 from file: 154)

DIALOG(R)File 154:MEDLINE(R)

(c) format only 1997 Knight-Ridder Info. All rts. reserv.

08308590 95329563

Depletion of **CD4+** and **CD8** + cells eliminates immunologic  
memory of thyroiditogenicity in murine experimental autoimmune thyroiditis.

Fuller BE; Giraldo AA; Waldmann H; Cobbold SP; Kong YC

Department of Immunology and Microbiology, Wayne State University School  
of Medicine, Detroit, Michigan 48201, USA.

Autoimmunity (SWITZERLAND) 1994, 19 (3) p161-8, ISSN 0891-6934  
Journal Code: A5H

Contract/Grant No.: DK 40721, DK, NIDDK; DK 45960, DK, NIDDK

Languages: ENGLISH

Document type: JOURNAL ARTICLE

2/3/84 (Item 9 from file: 154)

DIALOG(R)File 154:MEDLINE(R)

(c) format only 1997 Knight-Ridder Info. All rts. reserv.

07419561 92368404

The forces driving autoimmune disease.

Roitt IM; Hutchings PR; Dawe KI; Sumar N; Bodman KB; Cooke A

Dept. of Immunology, University College & Middlesex School of Medicine,  
London, UK.

J Autoimmun (ENGLAND) Apr 1992, 5 Suppl A p11-26, ISSN 0896-8411  
Journal Code: ADL

Languages: ENGLISH

Document type: JOURNAL ARTICLE; REVIEW; REVIEW, TUTORIAL

2/3/85 (Item 10 from file: 154)

DIALOG(R)File 154:MEDLINE(R)

(c) format only 1997 Knight-Ridder Info. All rts. reserv.

06620943 91370929

Reprogramming the immune system for tolerance with monoclonal  
**antibodies.**

Cobbold SP; Qin SX; Waldmann H

Department of Pathology, Cambridge University, UK.

Semin Immunol (UNITED STATES) Nov 1990, 2 (6) p377-87, ISSN 1044-5323  
Journal Code: A61

Languages: ENGLISH

Document type: JOURNAL ARTICLE; REVIEW; REVIEW, TUTORIAL

2/3/86 (Item 1 from file: 399)

DIALOG(R)File 399:CA SEARCH(R)

(c) 1997 American Chemical Society. All rts. reserv.

126058863 CA: 126(5)58863v PATENT

Induction of immunological tolerance by the use of non-depleting anti-CD4  
antibodies

INVENTOR(AUTHOR): Knowles, Robert W.; Cavender, Druie E.; Thomas, Judith  
M.

LOCATION: USA

ASSIGNEE: Johnson and Johnson Corporation  
PATENT: PCT International ; WO 9636359 A1 DATE: 19961121  
APPLICATION: WO 96US6912 (19960516) \*US 443739 (19950518)  
PAGES: 20 pp. CODEN: PIXXD2 LANGUAGE: English CLASS: A61K-039/395A;  
C07K-016/28 DESIGNATED COUNTRIES: AL; AM; AT; AU; AZ; BB; BG; BR; BY; CA;  
CH; CN; CZ; DE; DK; EE; ES; FI; GB; GE; HU; IS; JP; KE; KG; KP; KR; KZ; LK;  
LR; LS; LT; LU; LV; MD; MG; MK; MN; MW; MX; NO; NZ; PL; PT; RO; RU; SD; SE;  
SG; SI DESIGNATED REGIONAL: KE; LS; MW; SD; SZ; UG; AT; BE; CH; DE; DK; ES  
; FI; FR; GB; GR; IE; IT; LU; MC; NL; PT; SE; BF; BJ; CF; CG; CI; CM; GA;  
GN; ML

2/3/87 (Item 2 from file: 399)  
DIALOG(R)File 399:CA SEARCH(R)  
(c) 1997 American Chemical Society. All rts. reserv.

117169437 CA: 117(17)169437t PATENT  
Nondepleting CD4-specific monoclonal antibodies for the treatment of  
insulin-dependent diabetes mellitus (IDDM)  
INVENTOR(AUTHOR): Cooke, Anne; Waldmann, Herman  
LOCATION: UK,  
ASSIGNEE: University College London  
PATENT: PCT International ; WO 9211869 A1 DATE: 920723  
APPLICATION: WO 92GB74 (920114) \*GB 91741 (910114)  
PAGES: 19 pp. CODEN: PIXXD2 LANGUAGE: English CLASS: A61K-039/395A  
DESIGNATED COUNTRIES: AT; AU; BB; BG; BR; CA; CH; DE; DK; ES; FI; GB; HU;  
JP; KP; KR; LK; LU; MG; MW; NL; NO; PL; RO; RU; SD; SE; US  
DESIGNATED REGIONAL: AT; BE; BF; BJ; CF; CG; CH; CI; CM; DE; DK; ES; FR;  
GA; GB; GN; GR; IT; LU; MC; ML; MR; NL; SE; SN; TD; TG

2/3/88 (Item 1 from file: 351)  
DIALOG(R)File 351:DERWENT WPI  
(c)1997 Derwent Info Ltd. All rts. reserv.

011033929  
WPI Acc No: 97-011853/199701  
XRAM Acc No: C97-003237  
Amt. of **non-depleting** anti-**CD4** antibody effective  
to induce immunological tolerance - useful to inhibit allo-graft  
rejection in primate subject, specifically bone marrow allo-graft  
Patent Assignee: JOHNSON & JOHNSON CORP (JOHJ )  
Inventor: CAVENDER D E; KNOWLES R W; THOMAS J M  
Patent Family:  
Patent No Kind Date Applicat No Kind Date Main IPC Week  
WO 9636359 A1 19961121 WO 96US6912 A 19960516 A61K-039/395 199701 B  
AU 9657479 A 19961129 AU 9657479 A 19960516 A61K-039/395 199712

Priority Applications (No Type Date): US 95443739 A 19950518  
Filing Details:  
Patent Kind Filing Notes Application Patent  
WO 9636359 A1  
Designated States (National): AL AM AT AU AZ BB BG BR BY CA CH CN CZ DE  
DK EE ES FI GB GE HU IS JP KE KG KP KR KZ LK LR LS LT LU LV MD MG MK MN  
MW MX NO NZ PL PT RO RU SD SE SG SI SK TJ TM TR TT UA UG UZ VN  
Designated States (Regional): AT BE CH DE DK EA ES FI FR GB GR IE IT KE  
LS LU MC MW NL OA PT SD SE SZ UG  
AU 9657479 A Based on WO 9636359  
Language, Pages: WO 9636359 (E, 17)

2/3/89 (Item 2 from file: 351)  
DIALOG(R)File 351:DERWENT WPI  
(c)1997 Derwent Info Ltd. All rts. reserv.

009140953

WPI Acc No: 92-268391/199232

XRAM Acc No: C92-119699

Use of single **non-depleting CD4** monoclonal

**antibody** - for treatment of insulin-dependent diabetes mellitus

(IDDM), arrests loss of insulin producing cells

Patent Assignee: UNIV COLLEGE LONDON (UNLO )

Inventor: COOKE A; WALDMANN H

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Main IPC	Week
WO 9211869	A1	19920723	WO 92GB74	A	19920114	A61K-039/395	199232 B
AU 9211647	A	19920817	AU 9211647	A	19920114	A61K-039/395	199245
			WO 92GB74	A	19920114		
EP 567490	A1	19931103	EP 92902288	A	19920114	A61K-039/395	199344
			WO 92GB74	A	19920114		
JP 6504283	W	19940519	JP 92502777	A	19920114	A61K-039/395	199424
			WO 92GB74	A	19920114		
AU 668081	B	19960426	AU 9211647	A	19920114	A61K-039/395	199624

Priority Applications (No Type Date): GB 91741 A 19910114

Filing Details:

Patent	Kind	Filing Notes	Application	Patent
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WO 9211869	A1			
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Designated States (National): AT AU BB BG BR CA CH DE DK ES FI GB HU JP  
KP KR LK LU MG MW NL NO PL RO RU SD SE US

Designated States (Regional): AT BE CH DE DK ES FR GB GR IT LU MC NL OA  
SE

AU 9211647	A	Based on	WO 9211869
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EP 567490	A1	Based on	WO 9211869
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Designated States (Regional): AT BE CH DE DK ES FR GB GR IT LI LU MC NL  
SE

JP 6504283	W	Based on	WO 9211869
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AU 668081	B	Previous Publ.	AU 9211647
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		Based on	WO 9211869
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Language, Pages: WO 9211869 (E, 19); EP 567490 (E); JP 6504283 (5)

2/3/90 (Item 3 from file: 351)

DIALOG(R)File 351:DERWENT WPI

(c)1997 Derwent Info Ltd. All rts. reserv.

008503137

WPI Acc No: 91-007221/199101

XRAM Acc No: C91-003203

**Non-depleting CD4 and CD8** monoclonal

**antibodies** - for inducing tolerance to foreign antigens in

transplant rejection, auto-immune disease, etc

Patent Assignee: COBBOLD S P (COBB-I); WALDMANN H (WALD-I); WELLCOME FOUND  
LTD (WELL )

Inventor: COBBOLD S P; WALDMANN H

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Main IPC	Week
WO 9015152	A	19901213				B	199101 B
PT 94214	A	19910208				B	199109
AU 9057258	A	19910107				B	199115
EP 474691	A	19920318	EP 90908270	A	19900531	B	199212
ZA 9004174	A	19920226	ZA 904174	A	19900530	B	199213
DD 296843	A5	19911219	DD 341218	A	19900531	B	199221
JP 4505919	W	19921015	JP 90508030	A	19900531	B	199248
			WO 90GB840	A	19900531		
HU 61341	T	19921230	HU 905134	A	19900531	B	199306
			WO 90GB840	A	19900531		
AU 657255	B	19950309	AU 9057258	A	19900531	B	199520
EP 474691	B1	19961113	EP 90908270	A	19900531	B	199650
			WO 90GB840	A	19900531		

DE 69029134 E	19961219	DE 629134	A	19900531 B	199705
		EP 90908270	A	19900531	
		WO 90GB840	A	19900531	
ES 2096588 T3	19970316	EP 90908270	A	19900531 B	199718
NZ 233889 A	19970624	NZ 233889	A	19900531 B	199732

Priority Applications (No Type Date): GB 8912497 A 19890531

Filing Details:

Patent	Kind	Filing Notes	Application	Patent
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WO 9015152 A

Designated States (National): AU CA FI HU JP KR US

Designated States (Regional): AT BE CH DE DK ES FR GB IT LU NL SE

EP 474691 A

Designated States (Regional): AT BE CH DE DK ES FR GB IT LI LU NL SE

JP 4505919 W	Based on	WO 9015152
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HU 61341 T	Based on	WO 9015152
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AU 657255 B	Previous Publ.	AU 9057258
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Based on	WO 9015152
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EP 474691 B1	Based on	WO 9015152
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Designated States (Regional): AT BE CH DE DK ES FR GB IT LI LU NL SE

DE 69029134 E	Based on	EP 474691
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Based on	WO 9015152
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ES 2096588 T3	Based on	EP 474691
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Language, Pages: EP 474691 (44); ZA 9004174 (57); JP 4505919 (19); EP